



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 4

345 COURTLAND STREET, N.E.  
ATLANTA, GEORGIA 30365

4ORC

September 19, 1995

CERTIFIED MAIL  
RETURN RECEIPT REQUESTED

John C. Stephens, Esquire  
Southwire Company  
P. O. Box 1000  
Carrollton, Georgia 30119

Re: Gaston Copper Recycling Corporation  
Final Administrative Order on Consent  
Docket No. 94-09-R

Dear Mr. Stephens:

Enclosed please find a copy of the Final Administrative Order on Consent (Consent Order) for Gaston Copper Recycling Corporation as issued by the Associate Director, Office of RCRA and Federal Facilities, Waste Management Division. The original Consent Order is being filed with the Regional Hearing Clerk.

If you have any questions, please contact me at (404)  
347-3555 ext. 2263.

Sincerely,

A handwritten signature in dark ink, appearing to read "Michael T. Newton".

Michael T. Newton  
Associate Regional Counsel

Enclosure

cc: James M. Kuszaj, Esquire

Mr. Randy Thompson  
S. C. DHEC

UNITED STATES  
ENVIRONMENTAL PROTECTION AGENCY  
REGION IV

IN THE MATTER OF:

GASTON COPPER RECYCLING CORPORATION  
Post Office Box 318  
Off Highway 321  
Gaston, South Carolina 29053

EPA ID # SCD 001 368 073

Respondent.

)  
) FINAL ADMINISTRATIVE  
) ORDER ON CONSENT

) DOCKET NO: 94-09-R

) Proceeding Under Section  
) 3008(h) of the Resource  
) Conservation and Recovery  
) Act, as amended,  
) 42 U.S.C. §6928(h).

FINAL ADMINISTRATIVE ORDER ON CONSENT

The parties to this Final Administration Order on Consent ("Consent Order"), the United States Environmental Protection Agency ("EPA") and Gaston Copper Recycling Corporation ("Respondent"), having agreed to entry of this Consent Order, it is therefore Ordered and Agreed that:

I. JURISDICTION

1. This Consent Order is issued pursuant to the authority vested in the Administrator of the United States Environmental Protection Agency (EPA) by Section 3008(h) of the Solid Waste Disposal Act, commonly referred to as the Resource Conservation and Recovery Act (RCRA or the "Act"), as amended by the Hazardous and Solid Waste Amendments of 1984, 42 U.S.C. § 6928(h). The authority vested in the Administrator has been delegated to the Regional Administrators by EPA Delegation Nos. 8-31 and 8-32 dated April 16, 1985, and has been further delegated by the Regional Administrator for Region IV to the Associate Director, Office of RCRA and Federal Facilities, Waste Management Division, by Regional Delegation 8-32 dated November 8, 1994. Section 3008(h) of the Act, 42 U.S.C. §6928(h), authorizes the Administrator of EPA or her delegatee, to issue an order requiring corrective action or such other response which she deems necessary to protect human health or the environment, if, on the basis of any information, she determines that there is or has been a release of hazardous waste or hazardous constituents into the environment from a facility that is, or was, authorized to operate under Section 3005(e) of the Act, 42 U.S.C. §6925(e).

This matter was initiated by the issuance of an Order on September 20, 1994 (the "Initial Order"). That Initial Order did

not become effective and is superseded by this Consent Order except for those portions incorporated by reference into this Consent Order.

2. This Consent Order is issued to Gaston Copper Recycling Corporation (GCRC), Respondent, the owner and operator of the Gaston Copper facility located off of Highway 321 approximately one and one-half miles south of the City of Gaston, Lexington County, South Carolina ("the facility"). This Consent Order is based upon the administrative record compiled by EPA and incorporated herein by reference. The record is available for review by Respondent and the public at EPA's office at 345 Courtland Street, N.E., Atlanta, Georgia 30365.

3. On November 22, 1985, EPA granted the State of South Carolina authorization to operate a hazardous waste program in lieu of the federal hazardous waste program pursuant to Section 3006(b) of RCRA, 42 U.S.C. §6926(b). In addition, on November 8, 1985, EPA published a notice in the Federal Register (see 50 Fed. Reg. 2170 pg. 46,437) regarding authorization of South Carolina to administer certain specified amendments to the RCRA program required as a result of the Hazardous and Solid Waste Amendments of 1984 (HSWA). The State, however, does not have authority to enforce §3008(h) of RCRA, 42 U.S.C. §6928(h).

4. Respondent consents to and agrees not to contest EPA's jurisdiction to issue this Consent Order or to enforce its terms. Further, Respondent will not contest EPA's jurisdiction to: compel compliance with the Consent Order in any subsequent enforcement proceedings, either administrative or judicial; require Respondent's full or interim compliance with the terms of this Consent Order; or impose sanctions for violations of this Consent Order.

## II. STATEMENT OF PURPOSE

1. In entering into this Consent Order, the mutual objectives of EPA and Respondent are: (1) to prepare a Comprehensive Current Conditions Report for all SWMUs and AOCs currently known to EPA; (2) to perform, if appropriate, Interim Corrective Measures (ICM) at the facility to relieve threats to human health and/or the environment; (3) to conduct Confirmatory Sampling where appropriate to determine whether or not a release has occurred from SWMUs or AOCs identified in the Comprehensive Current Conditions Report; (4) to conduct a groundwater assessment; (5) to compile a Comprehensive SWMU Identification Report; (6) to perform a RCRA Facility Investigation (RFI) to determine fully the nature and extent of any release of hazardous wastes and/or hazardous constituents at or from the facility; (7) to perform a Corrective Measures Study (CMS) to identify and evaluate alternatives for the corrective measures necessary to prevent, mitigate, and/or remediate any releases of hazardous

wastes or hazardous constituents at or from the facility and to identify the most environmentally beneficial corrective measure(s); (8) to implement the corrective measure or measures selected by EPA at the facility; and (9) to perform any other activities necessary to evaluate or correct actual or potential threats to human health and the environment resulting from the release or potential release of hazardous wastes or constituents at or from the facility.

2. By entering into this Consent Order, or by taking any action in accordance with it, Respondent does not admit any findings of fact, conclusions of law, determinations, or any allegations contained in this Consent Order, nor does Respondent admit liability or any responsibility for the alleged release or threat of release of any hazardous waste or hazardous constituent into the environment. In addition, by entering into this Consent Order, Respondent does not concede that the activities contained in this Consent Order are necessary to protect human health or the environment. The participation of the Respondent in this Consent Order shall not be admissible against Respondent in any judicial or administrative proceeding, except for an action by EPA to enforce the terms of this Consent Order.

### III. PARTIES BOUND

1. This Consent Order shall apply to and be binding upon EPA, Respondent and its officers, directors, employees, agents, successors and assigns, heirs, trustees, receivers, and all other persons including, but not limited to, firms, corporations, parent companies, contractors, independent contractors, subcontractors, or consultants who act for, are owned by, or are in an agency relationship with the Respondent, and who conduct, monitor or perform any work pursuant to or required by this Consent Order.

2. No change in ownership or corporate status relating to the facility will in any way alter Respondent's responsibility under this Consent Order. Any conveyance of title, easement, or other interest in the Respondent's facility, or a portion of the Respondent's facility, shall not affect Respondent's obligations under this Consent Order. Respondent will be responsible for and liable for any failure to carry out all activities required of Respondent by the terms and conditions of the Consent Order, regardless of Respondent's use of employees, agents, contractors, or consultants to perform any such tasks.

3. Respondent shall provide a copy of this Consent Order to all contractors, laboratories, and consultants retained to conduct or monitor any portion of the work performed pursuant to this Consent Order and shall do so within fifteen (15) days of the effective date of this Consent Order or the date of

retention, and shall condition all such contracts on compliance with the terms of this Consent Order.

4. Respondent shall give written notice of this Consent Order to any successor in interest prior to transfer of ownership or operation of the facility or a portion thereof and shall notify EPA within thirty (30) days prior to such transfer.

5. Respondent agrees to undertake all actions required by the terms and conditions of this Consent Order, including any portions of this Consent Order incorporated by reference. Respondent waives any rights to request a hearing on this matter pursuant to §3008(b) of RCRA and 40 C.F.R. Part 24, and consents to the issuance of this Order as a Consent Order issued pursuant to §3008(h) of RCRA without a hearing pursuant to §3008(b) of RCRA.

6. For purposes of this Consent Order, "day" shall mean a calendar day unless expressly stated to be a business day. "Business day" shall mean a day other than a Saturday, Sunday or Federal Holiday. In computing any period of time prescribed by this Consent Order, the day of the act, event or default from which the designated period of time begins to run shall not be included. The last day of the period shall be included, unless it is a Saturday, Sunday or Federal Holiday, in which event the period shall run until the end of the next business day.

7. Submittal of any document that Respondent is required to provide to EPA or DHEC pursuant to this Consent Order shall be considered complete upon placement of the document in the mail or in overnight delivery service or upon hand delivery of the document as provided in Section IX.B.2.

#### IV. EPA'S FINDINGS OF FACT

1. Gaston Copper Recycling Corporation (GCRC), incorporated on September 6, 1990, and organized under the laws of the State of Georgia, is authorized to do business in the State of South Carolina, and is a person as defined in Section 1004(15) of RCRA, 42 U.S.C. §6903(15).

2. Since September 19, 1990, GCRC has owned and operated a facility located off of Highway 321, approximately one and one-half miles south of the City of Gaston, South Carolina. That facility is a "facility" as defined in 40 C.F.R. 260.10. Prior to September 19, 1990, the property was owned and operated by the Nassau Recycle Corporation or AT&T Nassau Metals Corporation (AT&T Nassau).

3. The facility began operations in 1976 as a secondary copper refinery under the name of Nassau Recycle Corporation (NRC). The entire property area encompasses a total of

approximately 400 acres, while the actual plant operations cover a total of approximately 200 acres. A map of the facility is included as Attachment 2 to this Consent Order.

4. Interim Status: Pursuant to Section 3005(e) of the Act, 42 U.S.C. §6925(e), and 40 C.F.R. §§270.1(b) and 270.70(a), NRC received "interim status" due to timely submission of its Section 3010 Notification and Part A of the Permit Application. Interim status facilities are subject to the regulations promulgated pursuant to Sections 3004 and 3005 of the Act, 42 U.S.C. §§6924 and 6925, which are codified in 40 C.F.R. Parts 260-265, 268 and 270.

5. Notification: On November 17, 1980, NRC notified EPA of hazardous waste activity as a RCRA generator and treatment, storage and disposal facility.

6. Part A Permit Application: Pursuant to Section 3005(e) of the Act, 42 U.S.C. §6925(e), on November 17, 1980, NRC submitted to EPA its Part A Hazardous Waste Permit Application to operate a hazardous waste container storage unit for mercury relays containing listed hazardous waste U151 (mercury). The following is an account of the revised Part A applications that have been submitted by the facility since November 17, 1980:

A. On May 2, 1984, a Part A Application was submitted to show a change in ownership from Nassau Recycle Corporation to AT&T Nassau Metals Corporation ("AT&T Nassau").

B. On July 23, 1985, AT&T Nassau submitted to the South Carolina Department of Health and Environmental Control (DHEC) an amended Part A Application to add 2 container storage areas, waste piles and a 6000-gallon storage tank to manage blast furnace baghouse dust, spent batteries and waste oil.

C. On July 8, 1986, AT&T Nassau submitted an amended Part A Application to add the following regulated units: a 2-million gallon surface impoundment and a 3-million gallon surface impoundment. The surface impoundments were listed for the storage of D008 waste (characteristic for lead content). At this time, the facility also added a 4,000 gallon container storage unit for wastewater treatment plant sludge hazardous for lead and cadmium (D008 and D006, respectively).

D. On May 15, 1987, AT&T Nassau submitted an amended Part A Application to correct a waste code from 6666 (a DHEC waste code for any waste declared hazardous by the generator, transporter, treater or storer of such waste) to 8888 (a DHEC waste code for waste oil) for a container storage unit.

E. On October 13, 1988, AT&T Nassau submitted a revised Part A Application to add the process of storing West Pond sediment in waste piles.

F. On June 14, 1990, GCRC submitted a revised Part A to reflect the transfer of ownership of the facility from AT&T Nassau to Gaston Copper Recycling Corporation.

7. Solid and Hazardous Wastes Managed at the Facility: The following types of wastes have either been managed at the facility in the past or are presently being managed.

A. Solid Wastes Managed: Solid wastes that have been managed at the facility include fluff, blast furnace granulated slag, waste oil, waste capacitors, PCBs/PCNs, low-level radioactive waste, contaminated soils, construction/demolition debris, wood/paper trash, asbestos, contaminated stormwater runoff, laboratory waste, and sanitary septage. Some of these solid wastes contain lead and PCBs as hazardous constituents. Other solid wastes include spent furnace brick and furnace bottoms. Both fluff and blast furnace granulated slag (no longer generated since the blast furnace is no longer operating), are routinely tested and frequently fail the TCLP test for lead content. When analyses indicate that the material is hazardous by characteristic, the material is handled as a hazardous waste rather than a solid waste.

B. Hazardous Wastes Managed: Hazardous wastes that have been managed at the facility include:

1. Fluff: Fluff is a solid waste which frequently exhibits the hazardous characteristic for lead content (D008).

2. Wastewater Treatment Plant (WWTP) Sludge: This sludge frequently exhibits the hazardous characteristic for lead (D008) and cadmium (D006) content.

3. Storm Water Sediments: These sediments have been identified by DHEC and the facility as hazardous for lead (D008) and cadmium (D006) content.

4. Blast Furnace Granulated Slag: This waste may exhibit the hazardous characteristic for lead content (D008) as determined by the TCLP test method, but has been sold for the manufacturing of roofing shingles.

5. Furnace Baghouse Dust: This waste routinely exhibits the hazardous characteristic for lead (D008), but is sold for metal reclamation.

8. Status of RCRA-Regulated Units: Since 1980, the facility has managed hazardous waste in eleven RCRA-regulated units. For purposes of implementing corrective action under this Consent Order, the Regional Administrator may designate any of these units as corrective action management units in accordance with 40 CFR §264.552. All but two of these units have been certified closed by DHEC. The following is a list of those regulated units and their current regulatory status:

- A. Process Pond 1: Closure certification approved by DHEC on 4/30/90.
- B. Process Pond 2: Closure certification approved by DHEC on 4/30/90.
- C. Process Pond 3: On May 18, 1994, DHEC notified GCRC that the closure of Pond 3 had been completed in accordance with the specifications in the approved RCRA Closure Plan. However, because of elevated levels of copper remaining in the pond, DHEC advised GCRC that closure of the pond per South Carolina regulations as an Industrial Waste Landfill was required.
- D. Stormwater Pond A: Closure certification approved by DHEC on 12/4/90.
- E. Stormwater Pond B: Closure certification submitted by GCRC on 11/22/93. Approval by DHEC is pending; further closure activities necessary.
- F. West Pond: Closure certification submitted by GCRC on 11/22/93. Approval by DHEC is pending; further closure activities necessary.
- G. Baghouse Dust Storage Area: Closure certification approved by DHEC on 11/1/91. This regulated unit is not the same unit as SWMU 8 identified as the Baghouse Dust Storage Area in the RFA, conducted by EPA in 1989. This regulated unit was not identified as a SWMU in the Initial Order and is not included as a SWMU in this Consent Order.
- H. Wastewater Treatment Sludge Storage Area: Closure certification approved by DHEC on 8/6/91. This regulated unit was not identified as a SWMU in the Initial Order and is not included as a SWMU in this Consent Order.
- I. West Pond Sediment Storage Bin: Closure certification approved by DHEC on 1/9/92. This regulated unit was not identified as a SWMU in the Initial Order and is not included as a SWMU in this Consent Order.

J. Fluff Waste Pile: Closure certification approved by DHEC on 8/21/92.

K. Hazardous Waste Soil Pile: Closure certification approved by DHEC on 7/5/95.

9. Solid Waste Management Units and Areas of Concern: The Initial Order contained various categories of Solid Waste Management Units ("SWMUs") and Areas of Concern ("AOCs"). Those SWMUs and AOCs have been consolidated into 34 groups for investigation purposes and renumbered as set out below. A cross index of the new group numbers for the consolidated SWMUs and AOCs to the listing of the SWMUs and AOCs in the Initial Order is attached as Attachment 1. The groups are, as follows:

- N1 Northeast Storage Area - This area is approximately 385,000 square feet in size and is located adjacent to the northeast corner of the plant site. N1 is an on-site disposal area operated sometime between 1976 and 1987 for disposal of soils from site excavations, building debris, used refractory furnace brick and wood pole debris. This landfill was capped with DHEC approval in 1988, with additional capping activities being carried out in 1990-91. SWMU.
- N2 Southeast Storage Area - This area is an on-site disposal area, approximately 200,000 square feet in size and located adjacent to the southeast corner of the facility. This area was used sometime between 1976 and 1987 for the disposal of material from on-site excavations, building debris, used refractory furnace brick, baghouse dust, Process Pond 1 sediments and wood pole debris. The disposal of the baghouse dust and Process Pond 1 sediments were one-time disposal events and the material was removed prior to capping. This SWMU was capped with DHEC approval in 1988, with additional capping activities being carried out in 1990-91. SWMU.
- N3 Maintenance Area - This area, approximately 1000 feet by 600 feet, was reported to have first served as the initial operating facility for the plant with scrap sorting and lead sweater operations back in 1976. The majority of the area is paved, with a vehicle maintenance building, a vehicle storage shed, and a roofed, curbed area for staging hazardous waste prior to off-site shipment. Waste staging in this area may have included plastic, waste oil, contaminated soil, and hazardous waste. Past waste staging and oil leaks from vehicles may have occurred over all paved surfaces of this area. GCRC operation since 1990 in this area has included storage of used oil, municipal waste and manifested hazardous wastes. N3-A through N3-F are included in the Maintenance Area.

N3-A: 3000-Gallon Used Oil Tanks (2) - Located south of the Maintenance Building, these two underground tanks were used for storage of waste lubricating and hydraulic oils prior to off-site reclamation and were removed in 1989. SWMU.

N3-B: Maintenance Shop Waste Oil Area - This fenced area is located just east of the maintenance shop building and includes a 500-gallon tank with a filling hopper welded to the top. Used vehicle oil is accumulated and stored in this tank prior to off-site reclamation. This area began operation in 1976 and is currently active. SWMU.

N3-C: Contaminated Soil Storage Area - This unit, consisted of a curbed concrete pad surrounded by steel guard rails, is located just east of the 3000-gallon used oil tanks (N3-A) in the Maintenance Area. Contaminated soils from site clean-up activities were stored in covered 20-cubic yard roll-off bins or in 55-gallon drums in this unit. SWMU.

N3-D: Truck Wash Area - This area is located outside the southeast corner of the maintenance shop building. The area consists of two concrete walls that adjoin the east wall of the maintenance shop building and a concrete base and a drain. Facility vehicles are driven into this area and washed with a steam wand to remove dirt, oils, and grease. This area began operation in approximately 1976 and is currently active. SWMU.

N3-E: Maintenance Area Runoff Ditch - This ditch is located at the southeast corner of the Maintenance Area pad and is at the bottom of the hill located just to the south of the Maintenance Area pad. This unit diverts runoff from the Maintenance Area pad to the Hard Pipe Drainage System (N13). The unit consists of a corrugated steel culvert with entrances from the north and from the west and a portion of unlined ditch that previously showed evidence of oily runoff stains. This unit also includes the sandy grassy area south of the Maintenance Area pad. SWMU.

N3-F: Pump Island North of Maintenance Building - This area is located north of the Maintenance Building and consists of two underground storage tanks. Two sampling points to the west of this pump station were found to have elevated levels of lead and cadmium (D&M Sampling Points "D-1" and "D-2"). AOC.

N4 Satellite Waste Oil Accumulation Areas - Since 1976, fifteen areas were used as distribution points for new lubricating and hydraulic oils for vehicles and equipment and as accumulation areas for waste oil. These satellite areas

were located either in outdoor shelters, inside production buildings or under outdoor roof structures. Only one of the original 15 areas, located in the Rod Mill, is still operating. Presently, all waste oil generated is generated at the Maintenance Area and accumulated at N3-B, Maintenance Shop Waste Oil Area. SWMU.

N5 Southwest Corner Area - In various historic aerial photographs, it appears that this area of the facility was used as a storage area for slag and other materials on ground surface soils before the area was paved in the mid-1980's. Dames & Moore's sampling points designated with "DD," and "Z" are included in this area.

N5-A: Baghouse Dust Storage Area - This storage area is located on a concrete pad west of the Dismantle and Salvage Area on the south side of the concrete storage bins. Pelletized baghouse dust was stored in this area prior to sale and off-site reclamation for zinc content. Baghouse dust that cannot be pelletized is stored in covered steel bins prior to off-site disposal. SWMU.

N5-B: Nonferrous Materials Pile - This area is located southwest of the pyrolysis unit in the southwest corner of the facility. From 1985 to 1987, a large portion of the shredded nonferrous material was stored directly on the soil. In 1987, this area was paved and uncovered concrete bins were installed for storage of the material. The area was reportedly excavated prior to paving but no sampling was performed. SWMU.

N5-C: Stormwater Collection Tank 2 - This 3.7 million gallon inground concrete tank was installed in 1988 to collect stormwater runoff, washdown water, and accidental leakage from process water systems. The tank is divided in half by a partition wall to allow continuous operation during sediment removal operations. Water from the tank is pumped to the facility's wastewater treatment system. SWMU.

N5-D: Pond 1 Soil Storage Area - This storage area, is located southeast of the southeast corner of the Tank House building. The unit is comprised of three reinforced cast-in-place concrete walls and a concrete pad sloped toward the back wall. Soil from Pond 1 was stored here for a portion of time in 1988 and was either sent offsite or sent back through the blast furnace. SWMU.

N5-E: Reinhart Area 4: One to five truckloads of granulated slag (estimated to be less than 10,000 pounds) was reportedly buried in this area for fill purposes. This area, located between the southwest corner of Perimeter Road and the South Swale, is not covered by concrete or asphalt

and is readily accessible. Dames & Moore identified a thin layer of slag in a trench immediately south of the slag storage bins which corroborated information provided to Dames & Moore that prior to construction of the nearby slag storage bins, granulated slag was stored throughout this area. Boundaries of this SWMU for the purposes of this Consent Order shall be as depicted in the Figure entitled "Parcel E" of the GEL report dated August 1, 1990. SWMU.

N5-F: Reinhart Area 6: This area is located between the south side of the Tank House and the north side of Stormwater Tank 2. Plastic fluff was reportedly encountered during construction of nearby Stormwater Tank 2. GEL performed soil borings and encountered fluff in one boring at 7 feet below grade and other non-indigenous materials in other borings in this area. For the purposes of this Consent Order, the boundaries of this SWMU are as depicted as "Parcel D" on the Cox & Dinkins plat map referenced in the GEL report dated August 1, 1990. Since the fluff was found near the boundary of the area, further investigation is warranted to determine if the present boundaries of this area should be expanded. SWMU.

N5-G: Old SWMU 54 (Dames & Moore's "Reinhart Area 7"): Reinhart Area 7 was originally described in the Initial Order as a grassy area located south of the Pyrolysis Unit which was covered with poling log stumps during the Dames & Moore investigation. However, based upon employee interviews, and for the purposes of this Consent Order, the true location of Reinhart Area 7 is now known to be geographically contiguous with Reinhart Areas 1 and 2 (see N22), as is Reinhart Area 5. N5-G now designates the area formerly described as SWMU 54 in the Initial Order. Further investigation is required of N5-G based upon the preliminary subsurface investigation by Dames & Moore, which indicated that the subsurface existence of solid wastes, which might contain hazardous constituents, was found in this area. SWMU.

N5-H: Southeastern Slag Operational Area: This area is located on the southwest side of the facility and accepted granulated slag from the Blast Furnace and the Slag Storage Bins (formerly known as SWMU 52, Dames & Moore's "Reinhart Area 5"; see N22). Screening operations were run on the slag generating slag fines, which were highly susceptible to dispersal by wind. Slag was accumulated in piles and bags in this area. This operation began in 1991 or 1992 and is no longer operating since the Blast Furnace has shut down. The slag processing building on this SWMU was built by GCRC in 1990 or shortly thereafter. Historic information indicates that the soils underlying this

building may have been impacted by past facility operations. SWMU.

N5-I: Slag and Furnace Feed Storage Areas - Various product materials, such as granulated slag, crushed slag, baghouse dust, and Pyrolysis Unit output have been stored in these outdoor storage areas. Most of these areas are located in three-sided concrete bins and all are on a concrete pad. These areas have been in operation since approximately 1976. AOC.

N5-J: Drainage from Slag Storage Bins - This area is represented by Dames & Moore sampling points "DD" and is located in the southwest area of the facility. Dames & Moore found elevated levels of lead and cadmium throughout this area. AOC.

N5-K: Southwest Area of Facility - In this area, shredder output, and later some pyrolysis unit output, was at times loaded into railroad gondola cars for sales to other entities prior to the period when the pyrolysis unit went on line, or thereafter when output exceeded processing capacity. This area is located adjacent to N5-G (Old SWMU 54) on its north side by the railroad siding. At times some release of these materials occurred during loading. Pavement covered this area and curbs were later added. It is unknown whether any of the materials may have spilled onto adjacent soils. Also, an area just to the west of the loading area mentioned above, and possibly within N5-H was a loading area for pelletized baghouse dust destined for sale to other entities. The baghouse dust was placed into overseas containers in this area during which time some release of the materials may have occurred and impacted adjacent soils. SWMU.

N5-L: Old SWMU 52 (Dames & Moore's "Reinhart Area 5") - Reinhart Area 5 was originally described in the Initial Order as encompassing three concrete slag storage bins and some surrounding area located to the east of Stormwater Tank 2 in the southwest area of the facility. Based upon employee interviews, and for the purposes of this Consent Order, Reinhart Area 5 is now included in grouping N21, as is Reinhart Area 7, since these two areas are geographically contiguous with Reinhart Areas 1 and 2 (See N21). However, further investigation is required of the original area described as SWMU 52, now designated as N5-L, based upon the preliminary subsurface investigation by Dames & Moore, which indicated that the subsurface existence of solid wastes, which might contain hazardous constituents, was found in this area. SWMU.

N5-M: West and South Swale - The West and South Swales are actually comprised of one continuous swale beginning in the southeast corner of the manufacturing area. From 1976 until 1982, this swale was an open ditch with concrete culverts under roadways leading to what is now Stormwater Pond B (N9-A). In 1983, the 11-acre area in the southwest corner of the process area was routed through a concrete pipe to the West Pond in response to PCB contamination of the swale from the process area. The remaining swale was partially lined with asphalt pavement and led to the new Stormwater Pond B. Prior to paving, contaminated soils in the swale with greater than 50 ppm PCBs were removed and disposed in a hazardous waste landfill. The swale is now partially lined with asphalt and currently drains the western portion of the facility. SWMU.

N6 Cooling Towers and Holding Tank - In addition to Cooling Towers 1 through 3, Dames & Moore sampling points designated with "M" are included in this grouping.

N6-A: Cooling Tower 1 - Cooling Tower 1, located just north of the Rod Mill metallurgical laboratory, is used to cool non-contact cooling water from the furnaces. At least some of the cooling towers used chromate-based corrosion inhibitors in the past. This unit has been in operation since 1978. SWMU.

N6-B: Cooling Tower 2 - Cooling Tower 2, located just north of the Rod Mill metallurgical laboratory, accepts contact cooling water from the Rod Mill. Graphite and oil spray are added to the process water that is circulated through this cooling tower. Make-up water is added to replace evaporative losses. This unit has been in operation since 1978. SWMU.

N6-C: Cooling Tower 3 - Cooling Tower 3 is located just north of the Rod Mill metallurgical laboratory. From 1978 to 1986, the unit was used as a process cooling tower for the anode casting operation. Cooling Tower 3 is now used as a collection sump for overflow water from the sanitary water system, the Laboratory Waste Holding Tank (N7), and the 90,000-Gallon Holding Tank (N6-D). This water was used as pyrolysis cooling make-up water. Materials of concern in the water may include rolling emulsions, dilute acids, and lead and copper metals. SWMU.

N6-D: 90,000 Gallon Holding Tank - This inground concrete tank was installed in 1988 for the storage and transfer of process water. The tank is 40 feet square and 14 feet deep with approximately 4 feet of freeboard. The tank has accepted water from a variety of sources including blowdown from the cooling towers, water from Stormwater Pond

A (prior to its closure) and treated sanitary wastewater from the North and South Holding Ponds. This water serves as makeup water for the cooling towers. SWMU.

N7 Laboratory Waste Holding Tank - This unit is a 10,000-gallon underground storage tank made of carbon steel, located just west of the metallurgical laboratory and north of the Rod Mill Building. This unit received dilute corrosive rinsewaters and some diluted solvents such as acetone and isopropyl alcohol from sink drains in the laboratory. The rinsewaters are discharged to Cooling Tower 3 and then used as process make-up water. In the past, the unit discharged to Process Pond 3 (now RCRA closed). The unit does not have a cathodic protection system and is buried 4-6 feet underground. The unit has been in operation since 1978. SWMU.

N8 Green Machine Water Treatment System

N8-A: Green Machine Treatment Unit - This water treatment unit, used from 1984 to 1987, consists of a parallel series of open-topped, above-ground steel tanks that were used for chemical addition and physical settling of solids. This unit is located on the south end of Process Pond 3. Prior to 1987, the system was used to remove solids to make process water from the process ponds suitable for make-up cooling water for the Melt Shop furnaces. During EPA's December 1994 site visit, rainwater and sediments were present in the open-topped tanks and the overflow catch basin for this unit was full and weeping out of side holes at the top of the basin onto soils below. SWMU.

N8-B: Sludge Thickening Tank - This above-ground steel 300-gallon tank, in use from 1984 to 1987, is located directly adjacent to N8-A. The tank accepted sludge from the Green Machine Treatment System and stored it prior to dewatering in the Filter Press (N8-C). The tank is supported approximately 3 feet above the soil on steel support posts. SWMU.

N8-C: Filter Press - This unit is located in a tin shed with a concrete curbed floor on the south end of Process Pond 3 directly adjacent to the Green Machine Treatment Unit and the Sludge Thickening Tank. This unit accepted thickened sludge from the Sludge Thickening Tank for dewatering prior to off-site disposal. The Filter Press was in operation from 1984 to 1987. SWMU.

N9 Northwest Area of Facility - This area encompasses Stormwater Pond B, Channel AB, the Temporary PCB Treatment Area, the West Pond, the Area West of Pond B Dike, and Dames & Moore sampling points "Q," "U," "R" and "EE."

N9-A: Stormwater Pond B - This pond, a RCRA-regulated surface impoundment, is located on the north side of the facility outside of the security fence. Pond B is a clay-lined pond which receives stormwater runoff from the West and South Drainage Swale (N5-M). GCRC submitted closure certification for this unit on November 22, 1993, but since DHEC's review of the closure activities performed revealed deficiencies and closure is still pending, this SWMU shall be included under this Consent Order. SWMU.

N9-B: Channel AB - Channel AB is located on the north side of the facility outside of the security fence and flowed east-west between Stormwater Ponds A and B. The channel had a natural soil bottom and a depth of approx. 10 feet. The channel widened near Pond A and turned south to a spillway from Pond A. Channel AB was normally used as an overflow storage area for Pond A stormwater. The channel was filled in with soil during 1994. SWMU.

N9-C: Temporary PCB Treatment Area - This area was located just west of Stormwater Pond B. The area underlying the unit was approximately 75 feet by 300 feet. This area was covered with a layer of sand and sparse vegetative growth. The unit operated for a short time in 1982 and consisted of several pools and filters connected in series to treat water collected from Stormwater Pond B prior to the installation of the wastewater treatment building system and the West Pond. The temporary unit had two contaminated water pools, a clarifier, a holding tank, a sand filter, three carbon filters, and three clean pools. SWMU.

N9-D: Area West of Pond B Dike - On October 23, 1990, heavy rains caused Pond B to overflow onto the low area west of the Pond B dike. AOC.

N9-E: West Pond - The West Pond, a RCRA regulated surface impoundment, is located west of the stormwater treatment plant. This pond was installed in 1983 as a holding pond for PCB-contaminated runoff from a 10-acre processing area at the facility. GCRC submitted closure certification for this unit on November 22, 1993, but DHEC's review of the closure activities performed revealed deficiencies. Since closure is pending, this SWMU shall be included under this Consent Order. SWMU.

N10 Rod Mill Emulsion Tanks/Main Bulk Fuel Oil Storage and Transfer Facility - Group N10 also includes Dames & Moore sampling points designated with "N".

N10-A: Rod Mill Emulsion Tank - This unit is located just north of the western end of the Rod Mill. This above-ground vertical steel tank has a capacity of 30,000 gallons.

The tank is surrounded by an earthen berm and an earthen basin. Prior to 1987, the tank was used for storage of process cooling water, mill lubricant (water, isopropyl alcohol, and oil and traces of gear and hydraulic oils). This tank was used at one time as a spent emulsion tank. This tank is included within N10 due to similar wastestreams and constituents of concern. SWMU.

N10-B: Rod Mill Spent Emulsion Tank/Main Bulk Fuel Oil Storage and Transfer Facility This is a containment area for two above-ground tanks south of the facility's wastewater treatment plant. The tanks, with a capacity of 300,000 gallons each, were originally used for fuel oil supply storage. When the tanks were put into place, a hypalon liner was placed in the spill control basin, which was designated as the Bulk Fuel Oil Containment Basin, and a six-inch layer of slag was placed over the liner as a traffic surface. The northern-most tank in this area is identified as the Rod Mill Spent Emulsion Tank. This tank accepts spent emulsion and spills from the Rod Mill. A one-time release of diesel oil occurred in this area in 1986 when a valve froze and broke. The spill was reportedly contained within the containment basin and remediated. This area also includes Nassau D. This area is also referred to in the Dames & Moore report as the "Main Bulk Fuel Oil Storage and Transfer Facility." SWMU.

N11 Lead Area: This area includes the Lead Building Area as well as SWMUs N11-B, N11-C, and Dames & Moore sampling points designated with "LA," "G," "F" and "E."

N11-A: Lead Building Area - This area is bounded on the north by Track C, on the east by the East Swale, the south by the facility property line, and the west by the western edge of the Lead Area office building. Dames & Moore conducted surface and subsurface sampling in the Lead Area located west of the Southeast Storage Area (N2) and detected surface soil levels of lead up to 5,670 mg/kg and of cadmium up to 54.7 mg/kg and subsurface soil levels of lead as high as 3,200 mg/kg in subsurface soils. One surface sample failed the EP Toxicity test for both lead and cadmium. Included in this area are the Ashy Wire Bailer and two sumps, located under the West Car Wash and the East Car Wash respectively. The Ashy Wire Bailer is an inground hydraulic compression device. The sump underneath the West Car Wash recycles water through a tiered system and serves to cool down the Ashy Wire Bailer. SWMU.

N11-B: East Swale - The East Swale is a stormwater drainage ditch that runs north-south to the east of the Lead Building along the eastern edge of the facility. From 1976 to 1982, the water in this ditch ran to Stormwater Pond A

(now RCRA closed). Prior to December 1987, the East Swale consisted of open ditches with concrete or corrugated steel culverts under roadways. In December 1987, all runoff from paved manufacturing and process areas was routed from the open stormwater drainage ditches into closed piping. In 1988, a total of 300-350 cubic yards of contaminated soil in the ditch was excavated and disposed of in accordance with a DHEC clean-up plan. SWMU.

N11-C: East Swale Contaminated Soil Storage - This concrete, curbed storage pad was used in 1987 and 1988 to temporarily store contaminated soil from the cleanup of the East Swale, prior to offsite disposal. This unit is located inside the southeast corner of the Perimeter Road on the lower level east of the lead ingot storage area southeast of the Lead Building. SWMU.

N12 Hard Pipe Drainage System - This system is an underground piping system used to divert stormwater runoff from process areas to storage areas. The first portion of the hard pipe system was installed in 1983 to divert potentially PCB-contaminated runoff generated in the low grade scrap area, from the West and South Swale (N12) and Stormwater Pond B (N9-A) to the West Pond for treatment. In 1988, this runoff was diverted via a hard pipe to Stormwater Collection Tank 2 (N5-C) for storage prior to treatment. The second portion of the hard pipe system was installed in 1987 to divert runoff generated in the eastern portion of the facility area, including the lead area from the East Swale (N11-B) directly to Stormwater Pond A (now RCRA closed) via an underground pipe. SWMU.

N13 Stormwater Treatment Plant

N13-A: DMP Stormwater Treatment Plant System - This wastewater treatment unit was located in the wastewater treatment plant just east of the West Pond. The DMP system, installed in 1983 to treat stormwater, is no longer in use. Although the neutralization tanks and two sand filters were removed from the system, other parts of the original DMP system are still in use in the wastewater treatment plant. SWMU.

N13-B: Met-Pro Stormwater Treatment System - This wastewater treatment unit was installed in 1983 to treat water from the West Pond and was located in the wastewater treatment building. The system has been completely dismantled and is no longer on the facility. During its operation, the Met-Pro system consisted of a neutralization tank, a flocculation tank, two slant tube clarifiers, a sludge thickening tank, a filter backwash tank, a carbon

absorption system, a filter press, and an effluent tank all connected in series. SWMU.

N13-C: DMP Sludge Container - Installed in 1983, this steel roll-off container was parked on the concrete pad just outside of the wastewater treatment building and was formerly used to store dewatered DMP sludge prior to off-site disposal. The container is no longer present at the facility but the area of the pad where the container was located may have been impacted. SWMU.

N13-D: Met-Pro Sludge Container - Installed in 1983, this steel roll-off container was located on the concrete pad just outside of the wastewater treatment building and was formerly used to store dewatered sludge from the Met-Pro Stormwater Treatment System filter press prior to off-site disposal. The container is no longer present at the facility but the area of the pad where the container was located may have been impacted. SWMU.

N13-E: Floor Drain Collection Tank at Stormwater Treatment Plant - This floor drain collection tank was a part of the Met Pro wastewater treatment system but the RFA did not include the collection tank in its description as part of the system. The floor drain collection tank is located on the outer west side of the wastewater treatment building. This collection tank is no longer in operation. AOC.

N14 Dismantle and Waste Storage Area - In addition to the N14-A through N14-C, N14 also includes the Dames & Moore sampling points designated with "P."

N14-A: Dismantle and Salvage Building - This area, which became active around 1980, consisted of several steel drums on wooden pallets in an enclosed and roofed area. This unit was used for the storage of small quantities of hazardous materials that were removed from scrap in the dismantle area which were sent off-site for reclamation or disposal. The unit is currently used to store bags of anode baghouse dust. SWMU.

N14-B: Incinerators - This area consists of two incinerators located towards the southern edge of the facility, adjacent to the Dismantle Waste Storage Area. The incinerators are approximately fifteen feet square and twelve feet high, with an approximate 180 cubic feet of capacity, and were fired by natural gas with afterburners. The purpose of the incinerators was to recover copper from scrap including polyethylene-jacketed cable, jelly-filled cable, and plastic wire. Exact dates of past use are not

defined, but the incinerators have not been used since GCRC acquired the facility in 1990. AOC.

N14-C: Storage of Soil/Sludge from Process Pond #3 - This area is believed to be located south of N14-A, Dismantle Waste Storage Area, and north of the Perimeter Road. Soils and sludge from Process Pond #3 were placed somewhere in this area (Low Grade Scrap Area) prior to disposition. AOC.

N15 Fallaws Pond and Discharge Ditch: In addition to N15-A and N15-B, N15 includes Dames & Moore surface soil sampling points designated with "R" and Dames & Moore sediment sampling points referred to as "Fallaws Pond - Left, Right and Center Channels."

N15-A: Fallaws Pond - Fallaws Pond is a 15-acre shallow pond, located west of the main plant site. The pond accepts the NPDES-permitted discharge from the facility's stormwater treatment system. Fallaws Pond drains to Boggy Branch, hence to Bull Swamp Creek and on to the North Fork Edisto River. SWMU.

N15-B: Discharge Ditch to Fallaws Pond - This discharge ditch runs between the wastewater treatment plant NPDES outfall and Fallaws Pond. Dames & Moore performed sampling of this area (sampling points labelled with "R" and referred to as "Fallaws Pond - Left, Right and Center Channels") and found lead and cadmium levels above background. AOC.

N16 Track B Storage Area and Non-Lead Shed Area

N16-A: Track B Storage Area - Track B is located to the south of the Maintenance Area on the eastern side of the facility. The Tinning Residue Storage Area, in operation from approximately 1976 to 1986, was located on the east end of Track B in the unloading area. At one time, the unit stored up to 150 55-gallon drums or 75,000 pounds of tin plating residues. The storage area is underlain with a large concrete pad and is covered with a roof structure. The area was used for temporary storage of tinning residues between delivery of the material and sale of the material off-site for reclamation. Also, waste oil soaked in sand, and unused wipes soaked in 1,1,1-trichloroethane in sealed plastic pouches were temporarily stored at the east end of Track B under roofed cover prior to disposal. The area was closed as a separate storage area in 1984. This area includes Dames & Moore sampling point S-3. SWMU.

N16-B: Non-Lead Shed Area - To the west of the Lead Area is a building formerly called the Non-Lead Shed, where

some general scrap sorting and dismantling was carried out. During a portion of 1989, unused wipes in sealed plastic pouches containing 1,1,1-trichloroethane were stored under the shed prior to disposal. AOC.

N17 Wastewater Treatment System

N17-A: Oxidation Pond - This clay-lined pond is part of the wastewater treatment system and has been in operation since 1976. This unit, along with N17-B, is used to treat the facility's sanitary wastewater and Truck Wash Area (N3-D) wastewater. SWMU.

N17-B: Polishing Pond - This clay-lined pond is part of the wastewater treatment system and has been in operation since 1976. This unit, along with N17-A, is used to treat the facility's sanitary wastewater and wastewater from the Truck Wash Area. SWMU.

N17-C: "Percolation" Ponds - These two clay-lined ponds (also known as the North and South Holding Ponds) are part of the wastewater treatment system in operation since 1976. Water from this system involving N17-A, B and C is used as process cooling make-up water. SWMU.

N17-D: Sanitary Sewer Line - Since 1976, this PVC-piped sewer line has been used to transport sanitary and truck wash wastewater. SWMU.

N17-E: Sprayfield - In 1982, this area was approved for use by SCDHEC for AT&T Nassau to spray excess water from the sanitary wastewater system in order to cope with a heavy rainfall season. The spray field is believed to consist of plastic pipe. The exact location of the Sprayfield is unknown, but reported to be somewhere north of Channel AB. AOC.

N18 Pyrolysis Unit - The Pyrolysis Unit, which began operation in 1984 and was in operation prior to GCRC's purchase of the facility, was designed to burn off all remaining plastics from shredded non-ferrous materials. This unit accepts nonferrous scrap materials which include copper, gold, silver, palladium, and platinum, plastics associated with this scrap material, and rolling emulsions from the Rod Mill. The infeed area is partially enclosed and the shallow concrete output pit has been levelled with concrete to avoid water collection. Also to be addressed with this SWMU are Dames & Moore sampling points designated with "S." SWMU.

N19 Process Furnaces - The process furnaces are used to process input materials to produce high grade copper and recover precious metals. Treated stormwater and sanitary wastewater

are used as non-contact cooling water in these furnaces. All of the units are fitted with baghouses and have air permits. These furnaces have been in operation since 1976, but ceased operation in January 1995. SWMU.

N20 Rod Mill

N20-A: Rod Mill - This unit is designed to process pure molten copper into 5/16 inch copper rod. Contact cooling water is used in the rolling process to quench the hot copper. The unit is fully enclosed in the Rod Mill building. SWMU.

N20-B: Building on South Wall of Rod Mill - Attached to the south wall of the Rod Mill is a small building, which at one time contained several barrels of a sludge-like material from the Old Wire Drawing Area. The materials were most likely copper-bearing sludge from the former wire-drawing process, consisting of copper shaved from the drawing of the wire along with a fatty substance and water for cooling and lubrication during the process. The sludge may have been processed. AOC.

N21 Reinhart Areas 1, 2, 5 and 7, West of Melt Shop:

N21-A: Reinhart Areas 1 and 2 - These two areas are considered contiguous and overlapping and are considered as a single area for the purpose of characterization. This area is located to the west of the Melt Shop with boundaries as pictured on Figure 14-7 of the Dames & Moore Report. Slag, granulated slag, furnace bottoms and miscellaneous debris were reportedly placed in this area. In 1987 or 1988, all waste materials, with the possible exception of a furnace bottom, were reportedly removed. Following removal and excavation, the entire area was covered with concrete. The facility has recently confirmed to DHEC that slag is still buried in this area and that soils are contaminated with lead. SWMU.

N21-B: Reinhart Area 5 - Reinhart Area 5 was originally described in the Initial Order as encompassing three concrete slag storage bins and some surrounding area located to the east of Stormwater Tank 2. Based upon employee interviews, and for the purposes of this Consent Order, Reinhart Area 5 is now included in group N21, as is Reinhart Area 7, since these two areas are geographically contiguous with Reinhart Areas 1 and 2, as depicted as "Parcel B" and "Parcel C" on the Cox & Dinkins plat map referenced in the GEL report dated August 1, 1990. SWMU.

N21-C: Reinhart Area 7 - Reinhart Area 7 was originally described in the Initial Order as a grassy area

located south of the Pyrolysis Unit which was covered with poling log stumps during the Dames & Moore investigation. However, based upon employee interviews, and for the purposes of this Consent Order, the true location of Reinhart Area 7 is now known to be geographically contiguous with Reinhart Areas 1 and 2 (N21-A), as is Reinhart Area 5 (N21-B). N5-G now designates the area formerly described as Reinhart Area 5 in the Initial Order. SWMU.

- N22 Reinhart Area 3: This area, located to the east of the Melt Shop, was used as a slag cooling area initially from approximately 1976 until 1982. In 1982, the area was reportedly excavated to clean soil and covered with concrete. However, further investigation is warranted since no confirmatory sample analyses were presented. After the area was covered with concrete, the slag pots from the anode furnace were placed directly on the concrete causing the concrete to deteriorate. The concrete has since been replaced with gravel. This area was operated until 1993. Boundaries of this SWMU should be verified through survey according to the Cox and Dinkins, Inc., map dated July 19, 1990, depicting the Reinhart Areas. SWMU.
- N23 Reinhart Area 8: This bermed area separates two wastewater treatment holding ponds, known as the North and South Percolation Ponds. Soil containing slag was found in this area in May 1990. The material was placed to increase the berm height after the original berm construction to prevent water from entering a groundwater well on the berm. In May 1990, the slag and soil were excavated to the original construction height and removed to the Melt Shop area and placed on the concrete pad now described as N21-D. SWMU.
- N24 Reinhart Area 9: This area is located to the north of Stormwater Pond A and was suspected to contain paper or metal barrels, brick, cable, oxidized slag, and anode ears, which according to employee interviews were stored on top of the soil. In May 1990, extensive trenching was conducted through most of this area, with only minor amounts of materials encountered at the surface. Dames & Moore excavated five trenches in the area northeast of Stormwater Pond A and found no evidence of subsurface disposal. However, no sampling and analysis was performed for the soils in this area. For the purposes of this Order, the boundaries of this SWMU are considered to be as depicted as "Parcel G" on the Cox & Dinkins plat map referenced in the GEL report dated August 1, 1990; however, the exact location of this SWMU requires further investigation. SWMU.

N25 Boneyard and Area BB

N25-A: Boneyard - The Boneyard is located on the west side of the facility. The boundaries of this area are as reflected in Figure 14-4 of the Dames & Moore report, entitled "Trench and Sewer Sampling Locations." Dames & Moore excavated and sampled 18 trenches in the Boneyard, each to an approximate depth of 3 feet. The top layer of soil in this area consisted of light grey sand and gravel, at thicknesses of three inches to one foot. One of Dames & Moore's consultants thought this top layer "might contain baghouse dust." The one sample of gray material suspected to include fluff contained 1,790 ppm lead, 39.0 ppm cadmium, 13,900 ppm copper, and 4,770 ppm aluminum (total metal concentrations). This sample also showed a TCLP lead level of 32.1 ppm. Included in this area are Dames & Moore sampling points designated with "W." SWMU.

N25-B: Area BB - The boundaries of this area are as reflected in Figure 14-4 of the Dames & Moore report, entitled "Trench and Sewer Sampling Locations." Dames & Moore excavated nineteen trenches in Area BB, north of the Boneyard at depths ranging from 3.5 to 14 feet. In one trench excavated in the central portion of Area BB, the bottom of the fill layer was deeper than the 14 feet maximum depth that could be excavated with the backhoe. The fill contained pieces of slag, red and brown brick, charred wood, and PVC piping. Refractory bricks were observed in both the northwest and southeast corners of the area to a depth of about 3.5 feet. Two samples of the fill material were analyzed for total lead and cadmium concentrations. The total lead concentration in the sample collected from the far northwestern corner of the area was 95.1 ppm. The total lead concentration in the sample collected from the SW corner was 19.5 ppm. Cadmium concentrations were below detection limits in both samples. Included in this area are Dames & Moore sampling points designated with "BB." SWMU.

N26 Yeargin Yard - The boundaries of this area are as reflected in Figure 14-4 of the Dames & Moore report, entitled "Trench and Sewer Sampling Locations." Dames & Moore excavated eleven trenches in the Yeargin yard immediately south of the Boneyard. No evidence of waste disposal was observed in this area; however, pieces of what appeared to be burned wood were observed in the fill. Since Dames & Moore did not observe any other suspect materials in the fill, no samples were submitted for laboratory analysis. SWMU.

N27 Melt Shop Area - The Melt Shop, in operation since approximately 1976, consists of a series of four melting furnaces: the blast furnace, a converter furnace and two anode furnaces. Concerns with this unit revolve around an

inground concrete slag collection pit and the slag stockpile pit, which are used to cool hot slag from the converter furnace. Facility personnel indicated that past operational practices in the slag stockpile pit may have allowed molten slag to penetrate the concrete and reach the underlying soils. Included in this area are Dames & Moore sampling points designated with "X." AOC.

N28 Tank House: This group includes the Tank House, Acid Unloading and Black Acid Loading Facility, the Tank House Slime Storage Area and Dames & Moore sampling points designated as "AA."

N28-A: Tank House - The Tank House is located south of the Rod Mill and west of the Melt Shop. This entire area is about 400 x 600 feet and includes a 300 x 500 feet Tank House which houses the electrolysis operation and surrounding areas used to store products generated in the Tank House. The Tank House contains electrolysis tanks on a grated floor structure supported by columns. The basement has a concrete floor and drain system that has an acid-resistant coating. The areas surrounding the Tank House are paved with concrete or asphalt. Prior releases of acid from the electrolysis tanks into the Tank House basement have occurred in the past. The Tank House was in operation prior to 1990 and is still in operation. Operations associated with a phased shutdown of the Tank House, which began in January 1995, have resulted in the drainage of additional electrolytic solution to the Tank House basement. An effort to refurbish the basement floor was underway at the time, so the integrity of the basement flooring is not known. The Tank House had been designed, however, to use the basement as an acid resistant containment unit for collection of spills or overflows prior to recovery of the material. AOC.

N28-B: Acid Unloading and Black Acid Loading Facility - This area is located on the southwest side of the Tank House, just north of the Boiler Fuel Oil Day Tank. This area was used to unload concentrated sulfuric acid from tank trucks and rail cars via hoses to an indoor storage tank. In the Part A application dated July 29, 1985, an aerial photograph showed a surface area of greenish-yellow liquid between the Tank House and the railroad tracks. No spill report was found in DHEC files. Also, a spill of 100 to 200 gallons of sulfuric acid occurred in March 1987 from a 12,000 gallon black acid tank located adjacent to the Tank House. The released material flowed into Pond B and contaminated soils were reportedly removed. SWMU.

N28-C: Tank House Slime Storage Area - Outside the northwest portion of the Tank House, an area has been used for container storage of tank house slimes. Slimes are

formed when anode impurities, consisting of precious metals and other metals such as antimony, drop out of solution and form a coating in the bottom of the tank. AT&T Nassau later roofed and fenced a specific area for slimes storage, which is located within the alcove in the northwest corner of the Tank House. Prior to roofing and fencing, the slimes storage area covered a wider area, but was in the same general vicinity. The slimes were recovered from the tanks and placed in the barrels indoors, the barrels were sealed and then placed outside for storage prior to sale to recyclers. Some of the barrels could have had some "rust-through" which would allow release of the slimes. AOC.

N28-D: Boiler Fuel Oil Day Tank and Fuel Line - This tank is located on the southwest corner of the Tank House underneath a shed roof. According to the Dames & Moore Report, leaks occurred in 1981, 1986 and 1987 from the underground No. 2 fuel oil line from the bulk fuel oil storage tanks (N10-B) to the Boiler Fuel Oil Day Tank. Reportedly, the 1981 release resulted from disconnection of or damage to a hose temporarily connecting the pipeline to the Day Tank. The 1986 spill resulted from corrosion of the pipeline and much of the leaked oil was released to the western edge of the drainage swale and recovered in Pond B. The 1987 spill occurred from a rupture in the fuel oil line on the west side of the Tank House. The released oil apparently contacted spent black acid which had run into a pit. Follow-up sampling revealed high lead levels. AOC.

N29 Truck Apron and Parking Areas: The following three areas are included in this grouping as well as the Dames & Moore sampling points designated as "A" and "B."

N29-A: Truck Parking Area North of Truck Shed - This area was sampled by Dames & Moore (sampling points labelled with "A"). Soil analyses showed that levels of total lead and total petroleum hydrocarbons were elevated. AOC.

N29-B: Truck Parking Area Near Central Storage - This area was sampled by Dames & Moore (sampling points labelled with "B"). Soil levels of total lead levels and total petroleum hydrocarbons were elevated. AOC.

N29-C: Paved Apron East of Receiving Docks - Tin sludge and copper mud were received and temporarily stored in this paved area. Although the materials were not waste, releases may have occurred since the drums in which they were placed were in sometimes uncertain condition, prior to being re-packaged into intact drums. This area is referred to as the Truck Shed in the Dames & Moore report. Later, the storage area for such items as these was under cover at Track B of the Railroad Receiving Shed (N16). AOC.

- N30 Chopping Area - This area includes the Chopping Building, the Low Speed Shredder, the Giant Shear and the surrounding concreted area located in the center of the facility. This area includes several processes where insulated wire scrap is recycled. The Giant Shear and the Low Speed Shredder are used to pre-chop insulated scrap wire. Processing equipment inside the Chopping Building separates the copper wire from the paper insulation and plastic coating. The plastic and paper generated from the chopping process may contain lead. There are baghouses adjacent to the Chopping Building that accumulate the plastic and paper. In addition, various pieces of process equipment may have released hydraulic fluid. Past equipment cleaning processes may have used water, with resultant waste water generation. This area has been in operation since prior to 1990. AOC.
- N31 Railroad Switching Yard - The Railroad Switching Yard is located on the eastern edge of the facility and consists of four parallel tracks approximately 500 feet long, joined at each end. This yard was used prior to GCRC operation and has been in operation by GCRC since 1990. GCRC uses railroad cars for transportation of copper-rich recyclable slag to other copper recovery facilities. Evidence of railroad car spillage is present and copper-rich slag has been observed in approximately ten different areas of the yard. AOC.
- N32 Stormwater Storage Tank No. 1 - This 21-million gallon, open-topped tank is located on the north side of the facility and receives stormwater from the majority of the paved areas of the facility. In 1992, the tank was constructed of reinforced concrete, with a diameter of 380 feet and with secondary containment. The tank was installed to replace Stormwater Ponds A and B and Channel AB and holds stormwater runoff prior to treatment in the wastewater treatment system. Stormwater runoff may contain sediments and small pieces of raw material as well as tramp oil from vehicles. It is currently in operation under an NPDES permit. Since its installation, there has been one overflow. AOC.
- N33 Area East of Melt Shop Building - An area approximately 50 x 20 feet of formerly unpaved soil lies to the south of the compressor annex of the Melt Shop and north of the original location of the converter furnace baghouse. At times, baghouse dust was released onto this area from the daily converter furnace baghouse operations. As part of the ongoing work to concrete all process areas, baghouse dust was eventually cleaned up from the area in the mid 1980's. The soil was then excavated and the area was paved. Included in this area are Dames & Moore sampling points "I-1" and "I-2" near the Baghouse Yard. SWMU.

N34 Other Cooling Towers - Three of the facility's cooling towers were listed in the RFA. In addition to those three, there are at least three other cooling towers in various areas of the plant. AOC.

10. Closed SWMUs: The Initial Order in Section IV.10.C. identified RCRA-regulated units at the facility. Eight of the RCRA-regulated units were identified as SWMUs in the Initial Order. Certain of those units, as listed below, have received DHEC approval as having been closed. As such, the closed units are not subject to any of the requirements under this Consent Order. Using the numbering system used in the Initial Order, these closed SWMUs are:

SWMU 16: Process Pond 1 - This pond, a RCRA regulated surface impoundment, was put in place around 1988 to hold and cool process water and contact cooling of water from the quenching of slag and shot at the blast furnace. On April 30, 1990, DHEC approved the clean closure certification for this unit.

SWMU 17: Process Pond 2 - This pond, also a RCRA regulated surface impoundment, was used since 1976 to hold and cool process water and contact cooling of water from the quenching of slag and shot at the blast furnace. On April 30, 1990, DHEC approved the clean closure certification for this unit.

SWMU 18: Process Pond 3 - This pond, also a RCRA regulated surface impoundment, was used since 1976 to treat and cool Rod Mill emulsion and dilute laboratory wastewater. It also accepted cooling tower blowdown and water from the domestic water treatment system. On May 18, 1994, DHEC notified GCRC that the closure of Pond 3 had been completed in accordance with the specifications in the approved RCRA Closure Plan. However, because of elevated levels of copper remaining in the pond, DHEC advised GCRC that closure of the pond per South Carolina regulations as an Industrial Waste Landfill was required.

SWMU 23: Stormwater Pond A - This pond, a RCRA-regulated surface impoundment, is located on the north side of the facility outside the security fence. Pond A is a clay-lined pond which received stormwater runoff from the East Drainage Swale (N11-B). On December 4, 1990, DHEC approved the clean closure certification for this unit.

SWMU 62: Fluff Waste Pile - RCRA Closure certification approved by DHEC on 8/21/92.

SWMU 63: Hazardous Waste Soil Pile - RCRA Closure certification approved by DHEC on 7/5/95; however, the slag

which was discovered underneath this unit will be addressed during the investigation of SWMUs N21-A, B and C.

11. Documentation of Release: According to documents cited in the RFA, as well as information presented in the Dames and Moore report and various DHEC documents, all of which are contained in the Administrative Record, which supports the issuance of this Consent Order, a number of releases of various hazardous wastes and hazardous constituents have occurred at the facility since 1981. Among the materials contained in such releases were: PCBs, diesel fuel, oil, cadmium, zinc, lead, copper, nickel and mercury. Descriptions of the releases as set out in the Initial Order are incorporated herein by reference. Respondent does not agree with nor admit to the findings of fact as stated in the Initial Order.

12. Need to Protect Human Health and the Environment: The hazardous wastes or hazardous constituents identified in paragraph 11 above may pose a threat to human health or the environment.

13. Geology and Hydrogeology: The description of the geology and hydrogeology of the facility as set out in the Initial Order is incorporated herein by reference. Respondent does not agree with nor admit to the findings of fact as stated in the Initial Order.

14. Topography, Surface Drainage, and Soils: The topographical information summarized in the Initial Order is incorporated herein by reference. Respondent does not agree with nor admit to the findings of fact as stated in the Initial Order.

15. Exposure Pathways: Hazardous wastes or hazardous constituents may further migrate from the facility into the environment through groundwater, surface water and wind/air dispersal. The descriptions of these pathways as set out in the Initial Order are incorporated herein by reference. Respondent does not agree with nor admit to the findings of fact as stated in the Initial Order.

#### V. CONCLUSIONS OF LAW AND DETERMINATIONS

Based on the foregoing findings of fact, and after consideration of the Administrative Record, the Associate Director, Office of RCRA and Federal Facilities, Waste Management Division, EPA Region IV, has made the following determinations:

1. Respondent is a "person" within the meaning of Section 1004(15) of RCRA, 42 U.S.C. Section 6905(15).

2. Respondent is the current owner and/or operator of a facility, located off of Highway 321, approximately one and one-

half miles south of the City of Gaston, South Carolina. This facility is a "facility" as defined in 40 C.F.R. §260.10.

3. Respondent has operated and is operating the facility under interim status subject to Section 3005(e) of RCRA, 42 U.S.C. §6925(e).

4. Respondent is a "generator" of hazardous waste as that term is defined at 40 C.F.R. §260.10.

5. Certain wastes and constituents thereof found at the facility are hazardous wastes and/or hazardous constituents pursuant to Sections 1004(5) and 3001 of RCRA, 42 U.S.C. 6903(5) and 6921, and 40 C.F.R. Part 261.

6. There is or has been a release of hazardous wastes and/or hazardous constituents into the environment from Respondent's facility.

7. The actions required by this Consent Order are necessary to protect human health and/or the environment.

#### VI. PROJECT COORDINATOR

1. Within ten (10) days of the effective date of this Consent Order, Respondent shall designate a Project Coordinator. Respondent shall notify EPA in writing of the Project Coordinator it has selected. The EPA Project Coordinator is identified below in Paragraph 2. Each Project Coordinator shall be responsible for overseeing the implementation of this Consent Order and for designating a person to act in his/her absence. The EPA Project Coordinator will be EPA's designated representative for the facility. All communications between Respondent and EPA, and all documents, reports, approvals, and other correspondence concerning the activities performed pursuant to this Consent Order shall be directed through the Project Coordinators.

2. The EPA Project Coordinator is:

Channing Bennett  
Waste Management Division  
U.S. EPA, Region IV  
345 Courtland Street, N.E.  
Atlanta, GA 30365

EPA will provide a written notice to Respondent of any change in the EPA Project Coordinator.

3. Respondent shall provide at least ten (10) days written notice prior to changing Project Coordinators, Professional Engineers/Geologists or Contractors/Subcontractors.

## VII. WORK TO BE PERFORMED

Pursuant to Section 3008(h) of RCRA, Respondent is hereby ordered to perform the acts specified in Section VII: Work to be Performed, in the manner and by the dates specified herein. All work undertaken pursuant to this Consent Order shall be performed in a manner consistent with, at a minimum: the attached Scopes of Work; the EPA-approved Interim Corrective Measures Workplan, RCRA Facility Investigation Workplan, Corrective Measures Study Workplan, and all other Workplans; RCRA and other applicable Federal laws and their implementing regulations; and applicable EPA guidance documents. Guidance may include, but is not limited to, documents listed in Attachment 3 through 6 of this Consent Order, which are incorporated by reference as if fully set forth herein. To the extent that the documents listed in Attachment 3 through 6 are inconsistent with any express provision of this Consent Order, this Consent Order shall govern.

EPA acknowledges that Respondent acquired the facility on September 19, 1990, and may not have reliable and accurate information concerning solid and hazardous waste management practices that occurred at the facility prior to that date. EPA and Respondent shall jointly identify the information concerning the facility that is currently available and Respondent shall use this information to complete any task in this Consent Order requiring information concerning activities occurring prior to GCRC's acquisition of the facility.

### A. COMPREHENSIVE CURRENT CONDITIONS REPORT

1. Within one hundred twenty (120) days of the effective date of this Consent Order, Respondent shall submit to EPA a Comprehensive Current Conditions Report (CCCR) for all identified or potential SWMUs or AOCs listed in Section IV.9. of this Consent Order and/or identified in the revised RCRA Facility Assessment report being prepared by EPA. The CCCR shall be in accordance with the requirements set out in Task V of the RFI Scope of Work appended as Attachment 3 to this Consent Order, with the exception that the summary of personnel qualifications required therein shall be submitted to EPA concurrently with the CCCR.

2. The CCCR shall contain a description of each SWMU or AOC, the status of each SWMU or AOC, a comprehensive schedule for the implementation of the Work to be Performed under this Consent Order, and any other information required for a CCCR by any other provision of this Consent Order. The CCCR shall also contain an assessment of any previously implemented interim measures, if any.

3. Within thirty (30) days following a request by EPA for an amended CCCR, Respondent shall submit an amended CCCR to EPA.

## B. NOTIFICATION AND ASSESSMENT REQUIREMENT

1. If at any time during the pendency of this Consent Order, Respondent obtains or discovers information concerning any newly discovered SWMU, any SWMU previously unreported to EPA or DHEC, or any newly discovered release of hazardous waste or hazardous constituents requiring a release report under any applicable environmental statute, Respondent shall notify EPA in writing within fifteen (15) days of its discovery.

2. Within ninety (90) days following the notification required in Paragraph 1, the Respondent shall, if requested by EPA, prepare and submit to EPA for review and approval, a RFA report for each SWMU identified under Paragraph 1.

## C. CONFIRMATORY SAMPLING (CS)

1. Within one hundred twenty (120) days of the effective date of this Consent Order, Respondent shall prepare and submit to EPA a Confirmatory Sampling (CS) Workplan to determine whether or not a release has occurred from SWMUs or AOCs identified in the Comprehensive Current Conditions Report. The CS Workplan shall include schedules of implementation and completion of specific actions necessary to determine whether or not a release has occurred. It shall address all affected media.

2. All CS Workplans must be approved by EPA, in writing, prior to implementation. EPA shall specify the start date of the CS Workplan schedule in the letter approving the CS Workplan. If EPA disapproves the CS Workplan, EPA shall either (1) notify the Respondent in writing of the CS Workplan's deficiencies and specify a due date for submission of a revised CS Workplan, (2) revise the CS Workplan and notify the Respondent of the revisions, or (3) conditionally approve the CS Workplan and notify the Respondent of the conditions.

3. The Respondent shall implement the confirmatory sampling in accordance with the approved CS Workplan.

4. EPA will review the CS Report(s) and will notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

5. Within ninety (90) days of EPA's approval of the CS Report, and completion of the Groundwater Assessment conducted pursuant to Paragraph 1 of Subsection D of this section, whichever event occurs last, Respondent shall submit to EPA for review and approval a Comprehensive SWMU Identification Report (CSIR). Based on this report, if EPA determines that additional investigations are needed, the Respondent shall be required to prepare a plan for such investigations as outlined in Paragraph 1

of Subsection E of this section. EPA will provide written notice of its determination to Respondent as to whether further investigations are needed.

6. The Comprehensive SWMU Identification Report shall be prepared according to the requirements and in a manner consistent with EPA's RCRA Facility Assessment Guidance (Office of Solid Waste, U.S. Environmental Protection Agency, Oct. 1986) and any other requirements of this Consent Order.

7. EPA will review the Comprehensive SWMU Identification Report and will notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work. If EPA, upon review of the Comprehensive SWMU Identification Report or other information, determines that there is no threat to human health and the environment from releases from a solid waste management unit at the facility, EPA shall identify such unit as requiring no further action pursuant to this Consent Order.

#### D. INTERIM CORRECTIVE MEASURES (ICM)

1. As an immediate interim corrective measure, within fifteen (15) days of the effective date of this Consent Order, Respondent shall arrange for installation of such additional piezometers or groundwater monitoring wells onsite and offsite as necessary to determine the horizontal and vertical extent of any contamination of groundwater underlying the facility, if any, which may be migrating offsite and affecting drinking water wells located to the east northeast of the facility. If it is determined that contaminated groundwater is migrating offsite and affecting drinking water wells, Respondent shall collect an adequate number of groundwater samples to detect whether or not any hazardous waste constituents exist in groundwater beneath the facility which exceed the MCLs for drinking water and which may pose a threat to human health and/or the environment. All groundwater sampling must be done in accordance with EPA's Environmental Compliance Branch Standard Operating Procedure and Quality Assurance Manual (See Attachment 6 to this Consent Order). Respondent shall submit a written report of its findings to EPA and DHEC in accordance with a schedule approved by DHEC in the Workplan for Assessment of Potentially Affected Groundwater near the GCRC facility. This report must focus upon whether the facility may be the source of the contaminants detected in private drinking water wells located to the east northeast of the facility.

2. In addition to the work required under Paragraph 1 of this subsection, Respondent shall evaluate available data and assess the need for other interim corrective measures. Interim corrective measures shall be used whenever possible to achieve the goal of stabilization which is to control or abate immediate

threats to human health and/or the environment, and to prevent or minimize the spread of contaminants while long-term corrective measures alternatives are being evaluated. Respondent shall include in the Comprehensive Current Conditions Report required by Subsection A of this section an assessment of previously implemented interim corrective measures. The assessment must evaluate other interim corrective measures alternatives that could be implemented at the facility and identify any new data needed for making decisions on stabilization. EPA shall determine when this data or information shall be collected. EPA will review Respondent's data and assessment and other information available to EPA, and select, if any, an appropriate interim corrective measure(s) for implementation by Respondent. If deemed appropriate by EPA, such selection may be deferred until additional data is collected.

3. Respondent shall submit to EPA a Workplan for the implementation of interim corrective measures ("ICM Workplan") within one hundred twenty (120) days of the effective date of this Consent Order. The ICM Workplan is subject to approval by EPA and shall provide for the performance of all interim corrective measures necessary to achieve stabilization at the facility in accordance with the Interim Corrective Measures Scope of Work appended as Attachment 3, with the exception that the Summary of Personnel Qualification and the Groundwater Assessment Program (GWA) Workplan shall be submitted concurrently with the submission of the ICM Workplan.

4. In the event that Respondent identifies an immediate or potential threat to human health or the environment, Respondent shall orally notify the EPA Project Coordinator or, if the EPA Project Coordinator is unavailable, his/her supervisor, within 48 hours of discovery and notify EPA in writing within five (5) days of such discovery summarizing the immediacy and magnitude of the potential treat to human health and/or the environment. Within ten (10) days of notifying EPA, Respondent shall submit to EPA an ICM Workplan for approval. If EPA determines that immediate action is required, the EPA Project Coordinator may orally authorize Respondent to act prior to EPA's receipt of the ICM Workplan.

5. If EPA identifies an immediate or potential threat to human health and/or the environment, EPA will notify Respondent in writing. Within ten (10) days of receiving EPA's written notification, Respondent shall submit to EPA for approval an ICM Workplan that identifies interim corrective measures which will mitigate the threat. If EPA determines that immediate action is required, the EPA Project Coordinator may orally require Respondent to act prior to Respondent's receipt of EPA's written notification.

6. All ICM Workplans shall ensure that the interim corrective measures are designed to mitigate immediate or potential threat(s) to human health and/or the environment, and must be consistent with the objectives of, and contribute to the performance of, any long-term remedy which may be required at the facility.

7. EPA will review the ICM Workplans and notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

8. In accordance with Attachment 3 herein, the ICM Workplan shall include the following sections:

- Interim Corrective Measures Objectives
- Public Involvement Plan
- Data Collection Quality Assurance
- Data Management
- Design Plans and Specifications
- Operation and Maintenance
- Project Schedule
- Interim Measure Construction Quality Assurance
- Reporting Requirements

8. Concurrent with the submission of an ICM Workplan, Respondent shall submit to EPA a Health and Safety Plan in accordance with Attachment 3 of this Consent Order.

#### E. RCRA FACILITY INVESTIGATION (RFI)

1. Within sixty (60) days of written notice by EPA of approval of the Comprehensive SWMU Identification Report pursuant to Section VII.C.7. of this Consent Order, Respondent shall submit to EPA and DHEC a Workplan for a RCRA Facility Investigation ("RFI Workplan") addressing all SWMUs or AOCs that have been identified in the approved Comprehensive SWMU Identification Report. The RFI Workplan is subject to approval by EPA and shall be developed in a manner consistent with the RFI Scope of Work contained in Attachment 4, with the exception that submissions of the Groundwater Assessment Program (GWA) Workplan as part of the ICM Workplan shall constitute compliance with Task VII of the RFI Scope of Work. Attachment 4 to this Consent Order is incorporated by reference as if fully set forth herein. The

RFI Workplan shall be developed in accordance with, at a minimum, RCRA, its implementing regulations, and EPA guidance documents determined by EPA to be relevant; including but not limited to, the RCRA Facility Investigation (RFI) Guidance Manual - Draft, (OSWER 9502.00-6D, EPA 530/SW-89-031, May 1989).

2. The RFI Workplan shall be designed to define the presence, magnitude, extent, direction, and rate of movement of any hazardous wastes or hazardous constituents within and beyond the facility boundary. The RFI Workplan shall document the procedures the Respondent shall use to conduct those investigations necessary to: (1) characterize the potential pathways of contaminant migration; (2) characterize the source(s) of contamination; (3) define the degree and extent of contamination; (4) identify actual or potential receptors; and (5) support the development of alternatives from which a corrective measure will be selected by EPA. A specific schedule for implementation of all activities shall be included in the RFI Workplan.

3. In accordance with the provisions of Attachment 4 herein, the RFI Workplan shall include: (a) a Project Management Plan, which includes a schedule of implementation of the Workplan, including preparation and submission of preliminary and final reports to EPA; (b) a Data Collection Quality Assurance Plan; (c) a Data Management Plan; and (d) a Public Involvement Plan.

4. The Public Involvement Plan shall, at a minimum, include an assessment of community concerns, development of a fact sheet and development of a mailing list.

5. Concurrent with the submission of the RFI Workplan, Respondent shall submit to EPA a Health and Safety Plan. If workplans for both an ICM and RFI are required by this Consent Order, Respondent may submit a single Health and Safety Plan that addressees the combined ICM and RFI activities.

6. Respondent shall submit an RFI report to EPA for approval in accordance with the EPA approved RFI Workplan schedule. EPA will review the RFI report and notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

#### F. CORRECTIVE MEASURES STUDY (CMS)

1. Within ninety (90) days of EPA's approval of the final RFI Report, Respondent shall submit a CMS Workplan to EPA. The CMS Workplan is subject to approval by EPA and shall be developed in a manner consistent with the CMS Scope of Work contained in Attachment 5 to this Order, which is incorporated by reference as

if fully set forth herein. EPA will review the CMS Workplan and notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

2. The CMS Workplan shall provide, at a minimum, the following information:

- A description of the general approach to the CMS and potential receptors.
- A statement of the overall objectives of the study;
- The specific plans for evaluating remedies to ensure compliance with the Media Cleanup Standards (MCS) at the point of compliance;
- The proposed format for the presentation of information;
- A justification for each corrective measure that Respondent proposes to study to achieve the MCS;
- Project Schedule.

3. Respondent shall prepare treatability studies for all potential corrective measures that involve treatment except where Respondent can demonstrate to EPA's satisfaction that they are not needed. The CMS Workplan shall include, at a minimum, a summary of the proposed treatability study and conceptual design, and a schedule for submitting the treatability study workplan or Respondent's justification for not proposing a treatability study.

4. The CMS workplan shall detail the methodology for developing and evaluating potential corrective measures to remedy any contamination at the facility. The CMS workplan shall identify the potential corrective measures, including any innovative technologies, that may be used for the containment, treatment and/or disposal of contamination.

5. Respondent shall submit a CMS Report to EPA for approval in accordance with the EPA approved CMS Workplan schedule. EPA will review the CMS Report and notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

6. The CMS Report shall contain, at a minimum, the following information for each corrective measure studied:

- An evaluation of any treatability studies performed;

- An evaluation of the overall protectiveness of human health and of the environment;
- Ability to attain the MCSs at the points of compliance;
- Ability to control the sources of releases;
- An estimate and analysis of quantity, volume, and/or toxicity of the waste generated, including, but not limited to, contaminated soil, sludge, and groundwater;
- Methods to minimize the volume, toxicity, and/or mobility of waste to be generated;
- An assessment of how institutional and legal requirements including federal, state, or local environmental or public health standards, regulations, and ordinances will affect the design, operation, and timing of each corrective action alternative;
- An assessment of short-term and long-term reliability and effectiveness, including but not limited to, the methodology used to estimate short-term and long-term reduction of toxicity, mobility, or volume of waste and the resulting estimate;
- An evaluation of ease of implementation;
- An estimate of the cost, including capital, and annual operation and maintenance costs;
- A recommendation as to which corrective measures, in Respondent's opinion, are the most appropriate, and the rationale for such recommendations.

7. In accordance with Section VIII: Public Participation, EPA will provide the public with an opportunity to submit written and/or oral comments and an opportunity for a public meeting regarding EPA's proposed cleanup standards and remedy for the facility.

8. Following the public comment period, EPA will notify Respondent which corrective measure is selected, if any, in a RCRA Final Decision and Response to Comments ("FDRTC"). EPA in its selection of the corrective measure shall consider the factors specified in paragraph 6 above. If the corrective measure recommended in the Corrective Measures Study Final Report is not the corrective measure selected by EPA after consideration of public comments, EPA will explain in the FDRTC the basis for such difference.

9. Concurrent with the submission of a CMS Workplan, Respondent shall submit to EPA a Health and Safety Plan. If Health and Safety Plans are required for the ICM, RFI, and CMS, Respondent may submit a revised Health and Safety Plan that addresses the facility's situation following the ICM and RFI activities..

G. CORRECTIVE MEASURES IMPLEMENTATION (CMI)

1. Within one hundred twenty (120) days after EPA's issuance of the FDRTC, Respondent shall submit to EPA a Corrective Measures Implementation Workplan ("CMI Workplan"). The CMI Workplan is subject to approval by EPA. EPA will review the CMI Workplan and notify Respondent in writing of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

2. The CMI Workplan shall be designed to facilitate the design, construction, operation, maintenance, and monitoring of corrective measures at the facility. The CMI Workplan shall also include, but not be limited to, the following sections:

- o Program Management
- o Public Involvement Plan
- o Design Plans and Specifications
- o Operation and Maintenance
- o Cost Estimate
- o Project Schedule
- o Construction Quality Assurance
- o Data Collection Quality Assurance
- o Data Management

3. Concurrent with the submission of a CMI Workplan, Respondent shall submit to EPA a CMI Health and Safety Plan. If a Health and Safety Plan was required for the CMS, Respondent may submit a single Health and Safety Plan that addresses the combined activities.

4. Respondent shall submit a CMI report to EPA in accordance with the EPA approved CMI Workplan schedule. EPA will review the CMI report and notify Respondent of EPA's approval/disapproval or modification in accordance with Section IX: Agency Approvals/Submittals/Proposed Contractor/Additional Work.

5. Respondent shall fully implement the CMI Workplan, as approved by EPA and according to the approved CMI Workplan and schedule. EPA reserves the right to determine, in its sole and unreviewable discretion, whether Respondent has fully implemented the CMI Workplan. If EPA determines that Respondent has not fully implemented the CMI Workplan, EPA may require any such additional work to be performed as EPA deems necessary.

VIII. PUBLIC PARTICIPATION AND COMMENT IN CORRECTIVE MEASURE(S) SELECTION

1. EPA will provide the public with an opportunity to review and comment on the final draft of the Corrective Measures Study Report, a description of EPA's proposed corrective measures, and EPA's justification for proposing the selected corrective measures (the "Statement of Basis").

2. Following the public comment period, EPA will notify Respondent which corrective measure is selected, if any, in a RCRA Final Decision and Response to Comments ("FDRTC"). If the corrective measure recommended in the Corrective Measures Study Final Report is not the corrective measure selected by EPA after consideration of public comments, EPA will explain in the FDRTC the basis for such difference.

3. The Administrative Record supporting the selection of the corrective measure will be available for public review at U.S. EPA Region IV, 345 Courtland Street, N.E., Atlanta, Georgia 30365.

IX. AGENCY APPROVALS/SUBMITTALS/PROPOSED CONTRACTOR/ ADDITIONAL WORK

A. EPA APPROVALS

1. EPA will provide Respondent with its written approval, approval with conditions, or disapproval, for any workplan, report (except progress reports), specification, or schedule submitted pursuant to or required by this Consent Order ("Submissions"). In the event of EPA's disapproval or approval with conditions of any Submission, EPA shall specify in writing the reasons for such conditional approval or disapproval, specifying any deficiencies in the Submission.

2. Respondent shall submit to EPA for approval a revised Submission which responds to any comments received and/or corrects any deficiencies identified by EPA's written comments within fifteen (15) days of Respondent's receipt of EPA's written comments unless EPA has specified an alternative later due date. Respondent shall submit to EPA any revised submittals in accordance with the due date specified by EPA. The revised

Submissions shall be subject to EPA approval, approval with conditions, or disapproval. In the event that EPA disapproves or approves with conditions, the revised Submission, Respondent may invoke the dispute resolution procedures of Section XXIII below.

3. Upon receipt of EPA's final written approval, or final decision under the dispute resolution procedures of Section XXIII below, Respondent shall commence work and implement any approved workplan in accordance with the schedule and provisions contained therein.

4. Any EPA approved report, workplan, specification, or schedule shall be deemed incorporated into this Consent Order. Prior to this written approval, no workplan, report, specification, or schedule shall be construed as approved and final. Oral advice, suggestions, or comments given by EPA representatives will not constitute an official approval, nor shall any oral approval or oral assurance of approval be considered binding.

#### B. SUBMITTALS

1. Beginning with the first calendar quarter which includes the effective date of this Consent Order, and throughout the period that this Consent Order is effective, Respondent shall provide EPA with quarterly progress reports. Progress reports are due by the fifteenth (15th) day of the month following the end of the previous calendar quarter. The progress reports shall conform to requirements in the relevant scope of work contained in Attachments 3-5.

2. Four (4) copies of all documents submitted pursuant to this Consent Order shall be sent by any of the following means - hand delivery, certified mail, return receipt requested, overnight certified express mail or overnight delivery service to the Project Coordinator or to other addressees she/he designates, unless otherwise specified by EPA. Three copies of all documents submitted pursuant to this Consent Order shall be sent by any of the following means - hand delivery, certified mail, return receipt requested, overnight express mail or overnight delivery service to DHEC, unless otherwise specified by DHEC.

#### C. PROPOSED CONTRACTOR/CONSULTANT

1. All work performed pursuant to this Consent Order shall be under the direction and supervision of a professional engineer, hydrologist, geologist, or environmental scientist, with expertise in hazardous waste cleanup. Respondent's contractor or consultant shall have the technical expertise sufficient to adequately perform all aspects of the work for which it is responsible. Within fifteen (15) days of the effective date of this Consent Order, Respondent shall notify the

EPA Project Coordinator in writing of the name, title, and qualifications of the engineer, hydrologist, geologist, or environmental scientist and of any contractors or consultants and their personnel to be used in carrying out the terms of this Consent Order.

#### D. ADDITIONAL WORK

1. EPA may determine based, in part, upon information not known to EPA at the time of issuance of this Order or at the time it approves a workplan or Respondent may propose that certain tasks, including investigatory work, engineering evaluation, or procedure/methodology modifications are necessary in addition to or in lieu of the tasks included in any EPA-approved workplan, when such additional work is necessary to evaluate or correct actual or potential threats to human health and the environment resulting from the release or potential release of hazardous wastes or constituents at or from the facility and to meet the purposes set forth in Section II: Statement of Purpose. EPA may determine that Respondent shall perform the additional work, and EPA will specify in writing the basis for its determination that the additional work is necessary. The scope of such additional work shall be consistent with the scope of work outlined in Section VII. Work To Be Performed. Within thirty (30) days after the receipt of such determination that the additional work is necessary, Respondent shall have the opportunity to meet or confer with EPA to discuss the additional work. If required by EPA, Respondent shall submit for EPA approval a workplan for the additional work. Such workplan shall be submitted within thirty (30) days of receipt of EPA's determination that additional work is necessary, or according to an alternative schedule established by EPA. Upon approval of a workplan, Respondent shall implement it in accordance with the schedule and provisions contained therein. Any disagreement between the parties concerning the scope of additional work under this section will be subject to the dispute resolution procedures of Section XXIII below, however, no stipulated penalties shall accrue during any such dispute resolution period. EPA retains the right under Section 3008(h) of RCRA to order Respondent to conduct any additional work not within the scope of this paragraph.

#### X. QUALITY ASSURANCE

1. Respondent shall follow the EPA Region IV Environmental Compliance Branch Standard Operating Procedures and Quality Assurance Manual, and other EPA guidance for sampling and analysis. Workplans shall contain quality assurance/quality control and chain of custody procedures for all sampling, monitoring, and analytical activities. Any deviations from the approved workplans must be approved by EPA prior to implementation; must be documented, including reasons for the deviations; and must be reported in the applicable report.

2. The name(s), addresses, and telephone numbers of the analytical laboratories Respondent proposes to use must be specified in the applicable workplan(s).

3. All workplans required under this Consent Order shall include data quality objectives for each data collection activity to ensure that data of known and appropriate quality are obtained and that data are sufficient to support their intended use(s).

4. Respondent shall monitor to ensure that high quality data is obtained by its consultant or contract laboratories. Respondent shall ensure that laboratories used by the Respondent for analyses perform analyses according to the latest approved edition of "Test Methods for Evaluating Solid Waste, (SW-846)," or other methods deemed satisfactory to EPA. If methods other than EPA methods are to be used, Respondent shall specify all such methods in the applicable workplan. EPA may reject any data that does not meet the requirements of the approved workplan or EPA analytical methods and may require resampling and additional analysis.

5. Respondent shall ensure that laboratories it uses for analyses participate in a quality assurance/quality control program equivalent to that which is followed by EPA. EPA may conduct a performance and quality assurance/quality control audit of the laboratories chosen by Respondent before, during, or after sample analyses. Upon request by EPA, Respondent shall have its laboratory perform analyses of samples provided by EPA to demonstrate laboratory performance. If the audit reveals deficiencies in a laboratory's performance or quality assurance/quality control, resampling and additional analysis may be required.

#### XI. SAMPLING AND DATA/DOCUMENT AVAILABILITY

1. Respondent shall submit to EPA the results of all sampling and/or tests or other data generated by it or its agents, consultants, or contractors pursuant to this Consent Order.

2. Notwithstanding any other provisions of this Consent Order, EPA retains all of its information gathering and inspection authorities and rights, including the right to bring enforcement actions related thereto, under RCRA, CERCLA, and any other applicable statutes or regulations.

3. Respondent shall notify EPA in writing at least fourteen (14) days before engaging in any field activities required by this Consent Order, such as well drilling, installation of equipment, or sampling. If Respondent believes it must commence emergency field activities without delay, Respondent may seek emergency telephone authorization from the

EPA Project Coordinator, or if the EPA Project Coordinator is unavailable, his/her Section Chief or Team Leader, to commence such activities immediately. At the request of EPA, Respondent shall provide or allow EPA or its authorized representative to take split or duplicate samples of all samples collected by Respondent pursuant to this Consent Order. Similarly, at the request of Respondent, EPA shall allow Respondent or its authorized representative(s) to take split or duplicate samples of all samples collected by EPA under this Consent Order.

4. Respondent may assert a confidentiality claim covering all or part of any information submitted to EPA pursuant to this Consent Order. Any assertion of confidentiality must be accompanied by information that satisfies the items listed in 40 C.F.R. §2.204(e)(4) or such claim shall be deemed waived. Information determined by EPA to be confidential shall be disclosed only to the extent permitted by 40 C.F.R. Part 2. If no such confidentiality claim accompanies the information when it is submitted to EPA, the information may be made available to the public by EPA without further notice to Respondent. EPA will not accept any confidentiality claim with regard to any physical or analytical data.

## XII. ACCESS

1. EPA, its contractors, employees, and/or any EPA representative(s) are authorized at reasonable times to enter and freely move about all property at the facility during the effective dates of this Consent Order for purposes relating to the activities required by this Consent Order, inter alia: interviewing facility personnel and contractors; inspecting records, operating logs, and contracts related to the facility; reviewing the progress of the Respondent in carrying out the terms of this Consent Order; conducting such tests, sampling or monitoring as EPA or its Project Coordinator deem necessary: using a camera, sound recording, or other documentary type equipment; and verifying the reports and data submitted to EPA by the Respondent. The Respondent shall provide EPA and its representatives access at all reasonable times to the facility and subject to Paragraph 2 below, to any other property to which access is required for implementation of this Consent Order. Respondent shall permit such persons to inspect and copy all records, files, photographs, documents, and other writings, including all sampling and monitoring data, that pertain to work undertaken pursuant to this Consent Order and that are within the possession or under the control of Respondent or its contractors or consultants subject to Section XI.4.

2. To the extent that work being performed pursuant to this Consent Order must be done beyond the facility property boundary, Respondent shall use its best efforts to obtain site access agreements necessary to complete work required by this

Consent Order from the present owner(s) of such property within thirty (30) days of approval of any workplan for which site access is required. Best efforts as used in this paragraph shall include, at a minimum, a certified letter from Respondent to the present owner(s) of such property requesting access agreement(s) to permit Respondent and EPA and its authorized representatives access to such property, and the payment of reasonable sums of money in consideration of granting access. The determination of what is a reasonable sum shall be by the agreement of the parties. Any such access agreement shall be incorporated by reference into this Consent Order and shall provide for access by EPA and its representatives. Respondent shall insure that EPA's Project Coordinator has a copy of any access agreement(s). In the event that agreements for access are not obtained within thirty (30) days of approval of any workplan for which access is required, or of the date that the need for access became known to Respondent, Respondent shall notify EPA in writing within ten (10) days thereafter of both the efforts undertaken to obtain access and the failure to obtain such agreements. EPA may, at its discretion, assist Respondent in obtaining access. In the event EPA obtains access, Respondent shall undertake EPA-approved work on such property. The Respondent shall indemnify EPA as provided in Section XIX: Indemnification, for any and all claims arising from activities on such property.

3. Nothing in this section limits or otherwise affects EPA's right of access and entry pursuant to applicable law, including RCRA and CERCLA.

4. Respondent's obligation to perform corrective measures beyond the facility boundary shall be excused to the extent that such corrective measures cannot be performed due to the lack of access where such access has been sought pursuant to Section XII.2. In case of transfer or lease of any portion of the facility, Respondent shall retain a right of access to the extent required to fully implement the terms of this Consent Order.

#### XIII. RECORD PRESERVATION

1. Respondent shall retain, during the pendency of this Consent Order and for a minimum of six (6) years after its termination, all data, records and documents now in its possession or control or which come into its possession or the possession of its divisions, officers, directors, employees, agents, contractors, successors and assigns which relate in any way to this Consent Order or to hazardous waste management and/or disposal at the facility. Subsequent to the termination of the aforementioned six (6) year period, Respondent shall provide written notification to EPA sixty (60) days prior to the destruction of any data, records or documents that relate in any way to this Consent Order, its implementation, or to hazardous waste management practices and/or disposal at its facility. At

EPA's request, Respondent shall then make such records available to EPA for inspection and/or EPA's retention or shall provide copies of any such records to EPA prior to discarding. Such written notification shall reference the effective date, caption, and docket number of this Consent Order and shall be addressed to:

Associate Director  
Office of RCRA and Federal Facilities  
Waste Management Division  
U.S. EPA, Region IV  
345 Courtland Street, N.E.  
Atlanta, GA 30365

2. Respondent, within ten (10) days of the effective date of this Consent Order, or at the time of retaining or employing any agent, consultant, or contractor for the purpose of carrying out the terms of this Consent Order, shall enter into an agreement with any such agents, consultants, or contractors whereby such agents, consultants, and/or contractor will be required to provide Respondent a copy of all documents produced pursuant to this Consent Order.

3. All documents pertaining to this Consent Order shall be stored by the Respondent in a centralized location at the facility to afford ease of access by EPA or its representatives.

4. All data, information, and records concerning, created for, or maintained by Respondent, in connection with this Consent Order, shall be made available to EPA upon request, subject to Sections XI.4. All employees of GCRC and all persons, including contractors and subcontractors who engage in activity under this Consent Order, shall be made available to and shall cooperate with EPA if information is sought.

#### XIV. NOTIFICATION AND DOCUMENT CERTIFICATION

Unless otherwise specified, all reports, correspondence, approvals, disapprovals, notices, or other submittals relating to or required under this Consent Order shall be in writing and shall be sent to:

1. Unless otherwise specified by EPA, four (4) copies of all documents to be submitted to EPA shall be sent to:

Channing Bennett  
Waste Management Division  
U.S. EPA, Region IV  
345 Courtland Street, N.E.  
Atlanta, GA 30365

2. Unless otherwise specified by DHEC, three (3) copies of all documents to be submitted to EPA shall also be sent to:

Randy Thompson, Director  
Division of Hazardous and Infectious Waste  
Management  
Bureau of Solid and Hazardous Waste Management  
South Carolina Department of Health and  
Environmental Control  
2600 Bull Street  
Columbia, South Carolina 29201

3. Documents to be submitted to the Respondent should be sent to the Project Coordinator designated by Respondent pursuant to Section VI above.

4. Any report or other document submitted by Respondent pursuant to this Consent Order which makes any representation concerning Respondent's compliance or noncompliance with any requirement of this Consent Order shall be certified by a responsible officer of GCRC.

5. The certification required by paragraph 4 above, shall be in the following form:

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

Signature:

Name:

Title:

Date:

#### XV. DELAY IN PERFORMANCE/STIPULATED PENALTIES

1. Unless there has been a written modification by EPA of a compliance date, a written modification by EPA of an approved workplan condition, or excusable delay as defined in Section XXIV. Force Majeure and Excusable Delay, if Respondent fails to comply with any term or condition set forth in this Consent Order

in the time or manner specified herein, Respondent shall pay stipulated penalties as set forth below upon written demand from EPA. Compliance by Respondent shall include commencement or completion, as appropriate, of any activity, plan, study or report required by this Consent Order in an acceptable manner and within the specified time schedules in and approved under this Consent Order. Stipulated penalties shall accrue as follows:

a. For failure to commence, perform, and/or complete field work as prescribed in this Consent Order:

<u>Time Frame</u>	<u>Penalty Per Day</u>
1-7 days	\$2,000.00
8-21 days	\$5,000.00
Each day thereafter	\$8,000.00

b. For failure to submit any draft or final workplans, plans, or reports, (other than progress reports), as required by this Consent Order:

<u>Time Frame</u>	<u>Penalty Per Day</u>
1-7 days	\$2,000.00
8-21 days	\$5,000.00
Each day thereafter	\$8,000.00

c. For failure to submit quarterly progress reports as required by this Consent Order:

<u>Time Frame</u>	<u>Penalty Per Day</u>
1-7 days	\$1,000.00
8-21 days	\$2,500.00
Each day thereafter	\$3,500.00

d. For failure to comply with any other provisions of this Consent Order:

<u>Time Frame</u>	<u>Penalty Per Day</u>
1-7 days	\$1,000.00
8-21 days	\$2,500.00
Each day thereafter	\$3,500.00

2. Penalties shall begin to accrue on the day after the complete performance is due or the day a violation occurs, and shall continue to accrue through the final day of, or correction of the violation. Nothing herein shall prevent the simultaneous accrual of separate stipulated penalties for separate violations of this Order. Penalties shall continue to accrue regardless of whether EPA has notified the Respondent of a violation. EPA may, in its sole discretion not subject to dispute resolution as provided in Section XXIII below, impose a lesser or no penalty for violations of this Consent Order.

3. All penalties owed to the United States under this Section shall be due and payable within thirty (30) days of the Respondent's receipt from EPA of a written demand for payment of the penalties, unless Respondent invokes the dispute resolution procedures under Section XXIII: Dispute Resolution. Such a written demand will describe the violation and will indicate the amount of penalties due.

4. Interest shall begin to accrue on any unpaid stipulated penalty balance beginning on the thirty-first day after Respondent's receipt of EPA's demand letter. Interest shall accrue at the Current Value of Funds Rate established by the Secretary of the Treasury. In accordance with 37 U.S.C. §3717(e), 4 C.F.R. §§101.1, and 102.12(d) and (e) and 40 C.F.R. §13.11(b) and (c), EPA is also entitled to collect additional interest as a penalty amount for any payments which are greater than ninety (90) days delinquent. The maximum rate of the additional interest is 6% per annum.

5. All penalties shall be made payable by certified or cashier's check to "Treasurer, United States of America" and shall be remitted to:

EPA - Region IV  
Regional Hearing Clerk  
P.O. Box 100142  
Atlanta, Georgia 30384

All such checks shall reference the name of the Facility, the Respondent's name and address, and the EPA docket number of this action. Copies of all such checks and letters forwarding the checks shall be sent simultaneously to the EPA Project Coordinator.

6. Respondent may dispute EPA's assessment of stipulated penalties by invoking the dispute resolution procedures under Section XXIII: Dispute Resolution. The stipulated penalties in dispute shall continue to accrue, but need not be paid, during the dispute resolution period. To the extent that Respondent does not prevail upon resolution of the dispute, Respondent shall

submit such payment to EPA within seven (7) days of receipt of such resolution in accordance with Paragraph 5 of this Section. To the extent Respondent prevails upon resolution of the dispute, no stipulated penalties shall be payable.

7. Neither the invocation of dispute resolution nor the payment of penalties shall alter in any way Respondent's obligation to comply with the terms and conditions of this Order.

8. The stipulated penalties set forth in this section do not preclude EPA from pursuing any other remedies or sanctions which may be available to EPA by reason of Respondent's failure to comply with any of the terms and conditions of this Consent Order. However, all stipulated penalties which are paid by Respondent may be offset against any and all penalties for the same violation which EPA may be entitled to collect as a result of other enforcement action.

9. No payments under this section shall be tax deductible for federal tax purposes.

#### XVI. RESERVATION OF RIGHTS

1. EPA expressly reserves all rights and defenses that it may have, including the right both to disapprove of work performed by Respondent pursuant to this Consent Order and to request that Respondent perform tasks in addition to those stated in Section VII: Work to be Performed.

2. EPA hereby reserves all of its statutory and regulatory powers, authorities, rights, and remedies, both legal and equitable, which may pertain to Respondent's failure to comply with any of the requirements of this Consent Order, including without limitation the assessment of penalties under Section 3008(h)(2) of RCRA, 42 U.S.C. 6928(h)(2). This Consent Order shall not be construed as a covenant not to sue, release, waiver, or limitation of any rights, remedies, powers and/or authorities, civil or criminal, which EPA has under RCRA, CERCLA, or any other statutory, regulatory or common law authority of the United States against Respondent or any other person. Nothing in this section shall diminish, impair, or otherwise adversely affect the authority of EPA to enforce the provisions of this Consent Order.

3. Compliance by Respondent with the terms of this Consent Order shall not relieve Respondent of its obligations to comply with any applicable provisions of RCRA or any other applicable local, State or Federal laws and regulations including without limitation, any conditions of a permit issued under RCRA or any other applicable State or Federal laws or regulations by EPA, the State of South Carolina, or any other entity.

4. This Consent Order shall not limit or otherwise preclude EPA from taking additional enforcement action pursuant to Section 3008(h) of RCRA or other available legal authorities against Respondent or any other person should EPA determine that such actions are warranted and necessary to protect human health and the environment.

5. EPA reserves the right to perform any portion of the work set forth herein or any additional site characterization, feasibility study, and remedial work as it deems necessary to protect human health and/or the environment.

6. If EPA determines that activities in compliance or noncompliance with this Consent Order have caused or may cause a release of hazardous waste or hazardous constituent(s), or a threat to human health and/or the environment, or that Respondent is not capable of undertaking any of the work ordered, EPA may order Respondent to stop further implementation of this Consent Order for such period of time as EPA determines may be needed to abate any such release or threat and/or to undertake any action which EPA determines is necessary to abate such release or threat.

7. This Consent Order is not intended to be nor shall it be construed as a permit. EPA's approval of any workplan does not constitute a warranty or representation that the Statement of Work or workplans will achieve the required cleanup or performance standards. Compliance by Respondent with the terms of this Consent Order shall not relieve Respondent of its obligations to comply with RCRA, CERCLA or any other applicable local, state, or federal laws and regulations, including but not limited to its obligation to obtain and comply with any applicable federal, state, county or local permit, nor is this Consent Order intended to be, nor shall this Consent Order be construed to be, a ruling or determination on, or of, any issue related to any federal, state, county or local permit.

8. Respondent expressly reserves whatever rights and defenses it may have unless otherwise specified in this Consent Order. Respondent also reserves all rights that it has or may have to assert claims against persons or entitles for matters arising out of the operation or ownership of the facility, including but not limited to claims for indemnification or contribution. Nothing herein shall be construed as a finding or admission by Respondent or EPA that prior owners or operators of the facility are exempt from the provisions of Section 3008(h) of RCRA.

#### XVII. OTHER CLAIMS

Nothing in this Consent Order shall constitute or be construed as a release from any claim, cause of action, demand, or defense in law or equity, against any person, firm, partnership, or corporation for any liability it may have arising out of or relating in any way to the generation, storage, treatment, handling, transportation, release, or disposal of any hazardous constituents, hazardous substances, hazardous wastes, pollutants, or contaminants found at, taken to, or taken or migrating from the facility.

#### XVIII. OTHER APPLICABLE LAWS

All actions required to be taken pursuant to this Consent Order shall be undertaken in accordance with the requirements of all applicable local, state, and Federal laws and regulations. Respondent shall obtain or cause its representatives to obtain all permits and approvals necessary under such laws and regulations.

#### XIX. INDEMNIFICATION

Respondent shall indemnify and save and hold harmless the EPA, its agents and employees, from any and all claims or causes of action arising solely from or on account of acts or omissions of Respondent or its officers, employees, agents, independent contractors, receivers, trustees, and assigns in carrying out activities required by this Consent Order. This indemnification shall not be construed in any way as affecting or limiting the rights or obligations of Respondent, EPA or the United States under their various contracts. Respondent shall not be responsible for indemnifying the EPA for claims or causes of action solely from or on account of acts or omissions of EPA.

#### XX. SUBSEQUENT MODIFICATION

1. Except as provided in Paragraph 4 below, this Consent Order may be amended only by mutual agreement of EPA and Respondent. Any such amendment shall be in writing, shall be signed by an authorized representative of each party, shall have as its effective date the date on which it is signed by EPA, and shall be incorporated into the Consent Order. Any oral agreement between EPA and Respondent, the purpose of which is to modify this Consent Order to address exigent circumstances, and which is subsequently ratified in writing by EPA and Respondent, shall have as its effective date the date of such oral agreement.

2. Any reports, plans, specifications, schedules, and attachments required by this Consent Order are, upon written approval by EPA, incorporated into this Consent Order. Any

noncompliance with such EPA-approved reports, plans, specifications, schedules, and attachments shall be considered a violation of the requirements of this Consent Order and shall subject Respondent to the statutory penalty provisions referenced in Section XV: Penalties for Noncompliance, of this Consent Order and other sanctions.

3. No informal advice, guidance, suggestions, or comments by EPA regarding reports, plans, specifications, schedules, and any other writing submitted to Respondent will be construed as relieving Respondent of its obligation to obtain written approval, if and when required by this Consent Order.

4. Minor modifications in the studies, techniques, procedures, designs or schedules utilized in carrying out this Consent Order and necessary for the completion of the project may be made by written agreement of the Project Coordinators. Such modifications shall have as an effective date the date on which the agreement is signed by the EPA Project Coordinator.

#### XXI. SEVERABILITY

If any provision or authority of this Consent Order or the application of this Consent Order to any party or circumstances is held by any judicial or administrative authority to be invalid, the application of such provisions to other parties or circumstances and the remainder of the Consent Order shall remain in force and shall not be affected thereby.

#### XXII. TERMINATION AND SATISFACTION

The provisions of this Consent Order, with the exception of Section XIII: Record Preservation, shall be deemed satisfied upon Respondent's receipt of written notice from EPA that Respondent has demonstrated, to the satisfaction of EPA, that the terms of this Consent Order, including any additional tasks determined by EPA to be required pursuant to this Consent Order, or any continuing obligation or promises have been satisfactorily completed. The EPA will not unreasonably withhold its determination of Respondent's completion of the terms of this Consent Order.

#### XXIII. DISPUTE RESOLUTION

1. The parties shall use their best efforts to informally and in good faith resolve all disputes or differences of opinion. The parties agree that the procedures contained in this section are the sole procedures for resolving disputes arising under this Consent Order. If Respondent fails to follow any of the

#### XXIV. FORCE MAJEURE AND EXCUSABLE DELAY

1. Force majeure, for purposes of this Order, is defined as any event arising from causes not foreseen and beyond the control of Respondent or any person or entity controlled by Respondent, including but not limited to Respondent's contractors, that delays or prevents the timely performance of any obligation under this Order despite Respondent's best efforts to fulfill such obligation. The requirement that Respondent exercise "best efforts to fulfill such obligation" shall include, but not be limited to, best efforts to anticipate any potential force majeure event and address it before, during and after its occurrence, such that any delay or prevention of performance is minimized to the greatest extent possible. Force majeure does not include increased costs of the work to be performed under this Consent Order or financial inability to complete the work.

2. If any event occurs or has occurred that may is likely to delay the performance of any obligation under this Consent Order, whether or not caused by a force majeure event, Respondent shall contact by telephone and communicate orally with EPA's Project Coordinator or, in his or her absence, the Chief of the RCRA Permitting and Compliance Branch within forty-eight (48) hours of when Respondent first knew or should have known that the event might cause a delay. Nothing herein shall authorize EPA to assess a stipulated penalty for failure to provide the forty-eight (48) hour notice if EPA has assessed a stipulated penalty associated with the resulting delay. If Respondent intends to claim that the event is a force majeure event, Respondent shall, within five (5) days of the telephone notification, provide to EPA in writing the anticipated duration of the delay; all actions taken or to be taken to prevent or minimize the delay; all other obligations affected by the force majeure event, and what measures, if any, taken or to be taken to minimize the effect of the event on those obligations; a schedule for implementation of any measures to be taken to prevent or mitigate the delay or the effect of the delay; Respondent's rationale for attributing such delay to a force majeure event if it intends to assert such a claim; and a statement as to whether, in the opinion of Respondent, such event may cause or contribute to an endangerment to public health, welfare or the environment. Respondent shall include with any notice all available documentation supporting its claim that the delay was attributable to a force majeure. Failure to comply with the above requirements shall preclude Respondent from asserting any claim of force majeure for that event. Respondent shall be deemed to have notice of any circumstances of which its contractors had or should have had notice.

3. If EPA determines that the delay or anticipated delay is attributable to a force majeure event, the time for

performance of such obligation under this Order that is affected by the force majeure event will be extended by EPA for such time as EPA determines is necessary to complete such obligation. An extension of the time for performance of such obligation affected by the force majeure shall not, of itself, extend the time for performance of any other obligation, unless Respondent can demonstrate that more than one obligation was affected by the force majeure event. If EPA determines that the delay or anticipated delay has been or will be caused by a force majeure event, EPA will notify Respondent in writing of the length of the extension, if any, for performance of such obligations affected by the force majeure event.

4. If EPA disagrees with Respondent's assertion of a force majeure event, Respondent may elect to invoke the dispute resolution provision, and shall follow the time frames set forth in Section XXIII: Dispute Resolution. In any such proceeding, Respondent shall have the burden of demonstrating by a preponderance of the evidence that the delay or anticipated delay has been or will be caused by a force majeure event, that the duration of the delay or the extension sought was or will be warranted under the circumstances, that best efforts were exercised to avoid and mitigate the effects of the delay, and that Respondent complied with the requirements of this Section. If Respondent satisfies this burden, the time for performance of such obligation will be extended by EPA for such time as is necessary to complete such obligation.

#### XXV. SURVIVABILITY/PERMIT INTEGRATION

Subsequent to the issuance of this Consent Order, a RCRA permit may be issued to the facility incorporating the requirements of this Consent Order by reference into the permit. No requirement of this Consent Order shall terminate upon the issuance of a RCRA permit unless (1) the permit is issued by EPA or DHEC, and (2) the permit specifically provides for termination of a requirement of this Consent Order, and (3) the Order requirement is expressly replaced by a requirement in the permit.

#### XXVI. EFFECTIVE DATE

The effective date of this Consent Order shall be ten (10) days after the date on which this Consent Order is signed by the Associate Director, Office of RCRA and Federal Facilities, Waste

Management, EPA, Region IV. EPA shall provide Respondent with prompt oral and written notice of the date this Consent Order is signed.

IT IS SO AGREED AND ORDERED;

DATE: 9/19/95

BY: James S. Kutzman  
James S. Kutzman  
Associate Director  
Waste Management Division  
United States Environmental  
Protection Agency  
Region IV

DATE: Sept 18, 1995

BY: John Avery  
JOHN AVERY  
Gaston Copper Recycling  
Corporation  
VICE PRESIDENT